ILLINOIS

UNIVERSITY OF ILLINOIS AT URBANA-CHAMPAIGN

PRODUCTION NOTE

University of Illinois at
Urbana-Champaign Library
Large-scale Digitization Project, 2007.

DATE March 1976 NO. 122

University of Illinois Graduate School of Library Science

US ISSN 0073-5310

OCCASIONAL PAPERS

THE UTILITY OF RETAIL SITE SELECTION FOR THE PUBLIC LIBRARY

by

WILLIAM C. ROBINSON

CONTENTS

MARKETING AND LIBRARIANSHIP

Librarians view marketing with both envy and contempt. We librarians have largely failed in all four basic areas of marketing--research, sales promotion, advertising, and sales. Only a small minority of the public uses our facilities, and we have had great difficulty in breaking out of a white middle class and often genteel perception of our societal role. We envy the marketer's substantial, often detailed knowledge of the consumer, and his ability to promote, advertise, and sell products to a particular market segment. Although we may be repelled by the "hard sell," planned obsolescence, and other practices of marketing, we can learn much by looking at our operations through the consumer's eyes and by examining his attitudes, habits and desires. Marketing does not have all the answers--Cox and Erickson say that "we are forced to admit . . . that we are still largely in the dark as to why consumers buy the items that they buy in the places that they do"[1] but even a brief survey of the marketing research literature is convincing in terms of the answers it gives.

The obvious question is: What characteristics do libraries share with retail outlets? Garrison argues that "branch libraries are not chain store outlets, and the problem of locating or relocating them is not solved solely in terms of volume of business."[2] Unhappily, he does not further develop his argument. The city/county planning department responsible for the still impressive Tucson study believes that "the location requirements of libraries are similar to those of commercial uses."[3] We can usually think of several reasons for removing the library from the hue and cry of retailing, and not all of these can be traced to a middle-class sense of the genteel. Since library service is "free," no income is generated, and the profit criterion is not available for use in evaluating service effectiveness. However, it is interesting that marketing studies show that turnover, either sales volume or sales per square feet, is the best single index to retail performance.[4] Library use counts may be a better indicator of "sales" than we originally thought. Of course, this argues for orientation toward demand rather than value. It may be that libraries which minister to needs rather than wants are exempt from comparison with retail outlets. Stores may sell to anyone, but libraries are often circumscribed by obsolete political boundaries which fragment service areas; the regional library card remains a future reality in most areas. Unlike retail outlets, libraries cannot pursue their "trading area." Minimal tax-supported funding for library operations makes it difficult to justify the frills which may attract patrons. Even today, a first-rate site may be considered a frill. Green's statement that it is "not the cost of real estate that is important but the market volume and profit opportunities that it offers"[5] ought to be as true of libraries as of retail outlets, but this remains a difficult viewpoint to sell to nonlibrarians.

There may be serious doubt as to whether libraries actually market their services at all. Libraries are generally monopolistic since they do not usually

compete for patrons. (Increasingly, however, they face competition from such varied sources as the mass media and the information entrepreneur.) Poor libraries do not go out of business, even if they suffer for lack of taxpayer support. The brutality of the market place with its "sell or go broke" immediacy, which is supposed to keep staff alert and consumer-oriented, is a distant drum indeed. Our "market research" is generally primitive if done at all, and little attempt is made to develop regular feedback from either consumers or nonconsumers. Bonser and Wentworth attack this lack of knowledge rather strongly:

> The business community uses a term, "market segmentation," the philosophy of which the libraries might adopt. In essence the term refers only to specific identification of particular "product" users, the determination of the special needs of each market "segment," and the design and merchandising of a product to meet those individualized needs. Barring this type of attempt on the part of our libraries to set goals for reaching specialized markets, and barring the establishment of specific programs to meet those goals, the public library seems destined to become more and more an extension of our public schools and a publicly subsidized recreation service for the well-educated housewives of our state.[6]

Although sometimes quite technical, Market Segmentation is a text which can be quite helpful to the librarian interested in this approach to community analysis.[7] Community or market identification and analysis is receiving more attention in library service and is a logical extension of more traditional and casual approaches to identification of the community served. Chitwood does a good job of relating the community--but not community segments--to site considerations.[8]

Sales promotion and advertising are often of the dowdy, standardized variety which we have come to think of as appropriate for publicly supported institutions. The manner of selling often limits sales to those who want to buy and who express their needs. Each librarian needs to consider the degree to which library materials and services should be marketed.

In any discussion of marketing and librarianship, bookselling is an obvious topic. We are closely related through a common commodity, and book sales have traditional roots in retailing. Unhappily, the literature is of little help. For example, Gross and Steckler advise the prospective bookseller to look for a store on a good shopping block with many people passing by, with neighboring stores selling high quality goods and with many customers.[9] With the exception of book clubs, mass market paperbacks, and the bookselling chains, booksellers seem to have largely ignored marketing and, like libraries, concentrate on serving those few who buy books regardless of promotion, advertising and selling. Even today, publishers and booksellers are severely handicapped by an inadequate knowledge of how to market their product most effectively, especially in creating a "mass" rather than a "class" audience.

In contrast to book shops, record stores are found everywhere and even where money is scarce, records are bought. Mass-market paperbacks seem to have the same sort of success. Both records and paperbacks are not usually sold, but sell themselves. Perhaps libraries could be designed so that our materials could "sell" themselves through display, impulse borrowing, etc. Library users are frequently the same people who buy trade books so that booksellers and libraries are complementary rather than competitive. We need to know much more about those people who ordinarily do not use libraries or purchase books from booksellers but who do buy books in mass market outlets or in specialized retail outlets. Increased knowledge of these customers is a sine qua non if we are to market informational and recreational materials.

Perhaps the major problem involved in applying marketing to librarianship is our lack of demand orientation. Frequently, librarians feel responsible for providing what is "needed" and what people ought to like rather than what people want. Although recent studies have shown that a considerable number of duplicate copies are necessary to satisfy patron demand for popular titles, libraries ordinarily minimize duplication. There is little attempt to utilize the dicta that "nothing sells merchandise like merchandise" by having adequate quantities at the "point of sale." The effect of this lack of availability on customer reaction to library service is largely unknown, but it would appear to inhibit repeat business.

In spite of characteristics distinguishing the library from retail outlets, the results of marketing research can be useful. We think of marketing too often in terms of gimmicks or "how-to-do-it" tips, while neglecting the considerable amount of valid and even generalizable research. Knowledge of customer behavior can have a substantial payoff; for example, marketing and motivational research can help to show who buys what and why. The growing literature on risk-taking and information-handling in consumer behavior emphasizes the importance of minimizing consumer uncertainty and risk. Although libraries have greatly improved their image in recent years with modern facilities, comfortable furnishings, and open stacks, I believe that most people feel uneasy with the library because of the complexity and strangeness of bibliographical tools, the lack of adequate informational signs and of devices which permit self-help, a climate which seems to inhibit rather than encourage questions, and an unfamiliarity with alternatives which prevents informed selection. Even if access to the library itself is not risky, there are real risks of selecting an unsatisfactory book when so many books look alike. Product loyalty, like the habit of always reading western stories, is a way to reduce risk in consumer decisions, but we know little about our patrons' "brand" loyalties. Since "risk attaches not only to what is acquired but also to how or where it is acquired,"[10] we need to look at libraries from a risk-minimizing perspective. How can librarians reduce perceived risk? How can we influence "word-of-mouth," which is the most important source of consumer information?[11] What do we know about the ways in which patrons acquire, process, utilize, evaluate and transmit information about materials? How can we translate attitudes about materials into consumer behavior? Could we construct

models of this process for better understanding and prediction of patron needs, attitudes, and problems so as to make library service more relevant and less risky for all? As Cox has stated:

> If we know something about the nature and amount of risk perceived by the consumer, it will help us understand and predict how and why she acquires, transmits, and processes information while solving problems associated with consumer decision making. [12]

Careful analysis of why and when purchases are made on impulse, by routine, or as the result of deliberation might help librarians in the arrangement and promotion of maximum use of library materials. With nearly 70 percent of all shopping decisions made after shoppers enter the store, impulse buying is important. A majority of shoppers carry no list but depend on such in-store devices as display techniques and arrangement, fixture selection, and visual merchandise presentation. Space/sales analysis should be a basic management tool, and libraries could benefit from its use.[13] Do our shelf arrangements provide for uniform merchandise exposure? How much library use is due to impulse buying and how does library arrangement facilitate or inhibit it? What kinds of materials lend themselves to impulse selection?

Libraries may consider traffic flow in planning a new building, but supermarket research has created both traffic flow models which predict where people will go and tested principles of layout and design.[14] For example, supermarkets place impulse items next to those with the strongest buying ratio since this is where most people stop. Would it be useful for libraries to compute ratios of passing items to borrowing them to determine which materials have the greatest sales potential? Can we utilize those guidelines used by progressive grocers to anticipate customer demand?

When we build the library's image, do we emphasize "youth and action," and do we arrange related merchandise in groupings designed to serve customers' interests in a dynamic, exciting environment? Marketing research can tell us which images attract and repel different groups of customers.[15] Increasing awareness of how consumer motives and attitudes are related to such variables as income level, time and energy available for shopping, shopping costs, store and product loyalty, age, education, social class, etc., has created great emphasis on market segmentation.[16]

Sales forecasting is the cornerstone upon which successful marketing rests and is necessary for effective budgeting, especially for program budgeting. In spite of this, most libraries fail to use forecasting techniques to rationalize their planning processes. Although this aspect of forecasting is much more limited and often inadequate, sales forecasting techniques for new products could be helpful to libraries concerned with forecasting potential demand for new services or for extending old services into new areas. Few libraries engage in "sales" forecasting which includes a "sales" goal and allows them to analyze and predict trends to maximize service and minimize cost.

Clearly, many aspects of marketing could have an impact on librarianship. The methodologically oriented reader will find much interesting and useful material in Ferber's Handbook of Marketing Research.[17] The purpose of this paper is to demonstrate how a particular aspect of marketing can be related to public libraries. I have chosen retail site selection for three reasons. First, as Epstein has stated, "geographic and marketing literature is rich in both theoretical and substantive works in regard to choice of retail locations."[18] Second, this is an area of retailing which librarians have repeatedly recognized as applicable to their own profession. Sometimes, recognition may be more implicit than explicit, as when a librarian argues that the public library site will be expensive because it should be very desirable to commercial interests.[19] Thompson is quite representative of the literature when he says: "A key position in a busy street may be expensive but, like any other businessman, the librarian knows that out of public sight is out of public mind."[20] Third, if it is true that, as Julius Chitwood states, "the selection of a site for a new library building is often one of the most difficult and enemy-producing decisions which has to be made,"[21] then the librarian should seek out all the relevant information available in other disciplines.

It may be helpful to make some brief generalizations about available literature on site selection in the two disciplines. The marketing literature consists of four types or levels of material which can be arranged in a hierarchy, with the greatest quantity at the bottom and the smallest at the top. As might be expected, the newsy article about new sites and new stores predominates. Next comes the how-we-did-it story which also describes a new store, but which mentions more specific details as to why that particular site was chosen (usually with emphasis on how modern and scientific the selection process was). Both of these types are individual-site-oriented and often appear in one of the practical, promotional journals like Chain Store Age. The next type, the thoughtful essay, is concerned with general principles of site selection and usually contains a checklist and descriptions of techniques and methods. The last level is theoretical. It aims at building models and constructing laws through the use of standard research techniques plus the newer tools of operations research and computer simulation. Although several basic monographs exist, usually of the handbook type, the great bulk of the literature is found in periodicals. References are limited to more important works, but it seems that if theoretical works on economic geography not specifically relating to retailing are ignored, the important literature on retail site selection would consist of less than one hundred items.

The library science literature on site selection is noticeably different. First, most articles are of the newsy and how-we-did-it variety. It was indeed rare to find examples of the thoughtful essay, and I could find no literature at the theoretical level. In fact, library site selection is treated in a vague way, with one or two basic "truths" emphasized and reemphasized. Literature on public library site selection generally focuses simplisticly on placing the library where the most people are, emphasizes the importance of pedestrian traffic, and suggests that parking is desirable but not necessary.[22]

Specifics are notably lacking. To say that the library building should be "central and easily accessible" or that "the best location is near a busy 'downtown' intersection or in any healthy shopping area or center with public parking nearby or enough parking on site, near public transportation [and] close to pedestrians" is not to say much.[23] There is little or no attempt to show how library sites are to be chosen in terms of specific methods or techniques other than to say, for example, that libraries ought to locate downtown where the greatest pedestrian traffic is, or next to a supermarket because grocery chains are unusually competent at site selection.[24] Even the standards are remarkably vague and unhelpful. Perhaps the reason for this contrast is that retailers have their own site selection specialists, while librarians must frequently take their location problems to city planners. Nevertheless, the vapid, vague nature of our literature should be a source of concern. A particularly interesting criticism of the library site selector's "make it simple, say it often" jargon may be found in the South Bend, Indiana City Planning Commission's Report on Central Library Site.[25] Garrison voices a similar, although milder, complaint about the failure of librarians to acquaint themselves with the work of city, county, and regional planning agencies which is often relevant to library site selection.[26] Although some librarians believe that libraries should be located according to retailing principles, they ignore the literature which contains those principles. Furthermore, the library literature on site selection is still so clearly and firmly made in the image of Joseph Wheeler that the two sometimes appear to by synonymous. With the exception of Harry Peterson, who appears to be the foremost Wheeler disciple, librarians seem to have concerned themselves with site selection only occasionally. Thus, criticism of librarianship in this area may appear to be a personal criticism when it should be a professional one.

Retail site selection bridges three disciplines: marketing, economics, and geography. Although we often lump business administration and economics together for convenience, the contrast in the literature is sometimes profound. Economics, like geography, has a substantial theoretical and often quantified tone to its literature, which may seem difficult and distant to those of us who sometimes have trouble with arithmetic calculation. Much useful information about site selection can be gained from the more theoretical findings of economics and economic/social geography; however, the complexity of the literature and a desire to emphasize practical application has led the author to emphasize the more easily understood, more immediate (and probably more valuable) literature of marketing. Let us examine the literature in more detail.

SOME THEORETICAL CONSIDERATIONS

Cox and Erickson state that "perhaps one facet of consumer demand--retail trade area determination--has gained more precision in marketing literature than has any other."[27] In part, this is because the variables involved--distance, population, census data, traffic flow, etc.--lend themselves to quantifiable approaches. Equally important, however, has been the existence of a considerable body of theory available in social and economic geography. Davies provides an

excellent review of the increasing and extensive geographic literature on the location of service activities.[28]

The best-known theoretical construct of economic and human geography is concerned with the concept of central place. This was first elaborated in 1933 by Walter Christaller in one of the most seminal works of modern geography, Die Zentralen Orte in Suddeutschland; Berry has also provided a succinct and informative summary discussion of central place theory. The essence of the theory is simple: each city forms the heart of a tributary area from which it draws its economic life blood so that the greater its centrality, the larger its hinterland, the higher its order, and the more goods and services that it will offer. Central place theory focuses on two essential variables: the threshold of a given business--"the smallest market area that will support the smallest economically feasible establishment of the class"--and the range of a central place--"the maximum distance consumers are willing to travel to it."[29] Higher order, central places provide more functions and have more functional specialization than do lower order places.

> There are threshold levels for providing functions below which a given function (service) is not available. For example, a country town of 100 people could not support a department store but, at some point up the hierarchy of central places, a population size is reached that will support a small department store and one is built.[30]

Thus, retail activities, like towns, may be grouped in a hierarchical spatial structure. Data about the centrality of cities and the nature of their tributary area make it possible to plot zones of retail influence, discover market area equilibrium, and forecast which geographic areas seem to lend themselves to particular levels of economic activity. Both the geometric configurations involved in central place theory and how they have been quantified may be seen in a variety of sources, but Berry's are notable.[31]

All urban concentrations may be ranked according to their centrality and the order of their retail activities. A site's utility is measured in terms of its centrality (thought to be synonymous with its accessibility) to the market it seeks to serve. As the necessary threshold increases (the minimal market area and population served is frequently used as a proxy), centrality becomes proportionately more important. However, as we will see later, there may be a point at which centrality then becomes less important (specialty stores are a good example because they require a mass of buying power ordinarily found in areas with higher incomes or larger populations).[32] Rent or site cost is a direct and tangible measure of this centrality/utility concept. The more central a location, the higher its rent will be. Rent and advertising are reciprocals because the money spent on one leaves less available for the other, and because high rent (therefore central location) should compensate for low advertising and vice versa.[33] This relationship is often lost on librarians, who lack the money for either high rent or much advertising. Traditionally, the most central site is the central business district (CBD) which serves areas far beyond the city limits. This is the retail center of the

first and highest order. Retail outlets may be ranked in the same way. Implicit in the idea of central place theory is the concept of definite, measurable thresholds--the minimum sales volume required for initial operation--for various kinds of economic activity. Obviously, the higher the threshold, the larger the supporting area must be. Shops with the highest thresholds and those whose sales depend on heavy pedestrian traffic will be in the CBD. In retailing, obvious analogies exist in the distance between the old-fashioned general store (which some modern supermarkets increasingly resemble) and the modern specialty shop. Ordinarily, business centers may be ranked from the smallest to the largest as follows: isolated convenience stores, street corner developments, neighborhood business centers, community business centers, regional shopping centers, and the central business district.[34] Although originally formulated to explain the size and location of towns, central place theory does provide a basic theoretical foundation for explaining distribution of retail goods and services, and is widely used in the literature of retail sites.

How well central place theory fits reality is a matter of considerable discussion, particularly in the confusion of contemporary urban metropolitan concentration. Brush and Gauthier argue that the mobility possible today through the automobile diffuses the force of centrality and produces a relatively random pattern of consumer travel.[35] Berry believes that the distribution and composition of contemporary retail trade, especially the trend to specialized marketing, denies central place theory.[36] Central place theory is in many ways bound by traditional transportation patterns, which produced a hub/spoke relationship between the center and the tributary area; automobile transportation may remove or alter the spokes and therefore change the nature of the hub.

What has happened to the central city will be discussed in more detail later, but as cities have become larger and as suburban metropolitan areas have expanded, so-called interceptor rings have been created which place new store sites in the path the consumer has been taking to the central city, thus reducing traffic to the core.[37] These rings, in turn, are vulnerable to competition from newer rings so that the neat hub/spoke analogy is replaced by a series of concentric retail sites which resemble a scatter plot.

Retailing always consists of a continual conflict between convenience and choice, but recent years have seen developments which have made it possible to increase <u>both</u> convenience and choice at the same time through the suburban shopping center. At a time when convenience appears to be more important than choice, the central city finds its convenience factor steadily decreasing. A variety of recent studies conclude that library use depends on convenience/accessibility rather than on selection.[38] Monat states that "the closer one lives to a library the more likely he is to use it," but he then argues that distance from home to library is not the strategic consideration in determining use.[39] This confusion suggests a profitable area for research.

Even if the applicability of the theory may be placed in doubt, its nomenclature permeates the literature of site selection. The idea of a central place

remains crucial to the concept of retail--and especially library--site selection, whether explicitly recognized or not.

As private ownership of the automobile increased, traditional forms of transportation--particularly interurban and street railways--declined and new patterns of mobility began to have an impact on retail structure. One of the first to recognize this fact and to attempt to come to grips with it was William Reilly, who in 1919 elaborated his now famous Law of Retail Gravitation:

$$D = d/1 + \sqrt{\frac{Pb}{Pa}}$$

Where D is the limit of town a's trading area in miles along road to town b, d is the distance in miles on the major paved road between two towns, Pa is the population of town a and Pb is the population of town b.[40]

Obviously, the formula is simply a mathematical statement of what may appear to be an obvious truth: consumers usually spend their money at the largest place with the easiest access. Reilly's Law captured the imagination of marketing because it helped to explain the great changes which the automobile made on the pattern of retail distribution.[41] It also proved to be, as Reilly had hoped, of great utility in locating retail stores, in computing the boundaries between retail trading areas, in selecting the areas in which retail stores should advertise, and in determining the volume of sales which a retail trading center may be expected to secure.[42]

The nature of the law made it possible to substitute individual stores in towns, driving time for miles, and floor space for population. Probably because of its simplicity, Reilly's Law, unlike central place theory, has been widely used by retailers as a practical tool for determining the best retail locations. Although the formula contains only population and distance variables, Reilly listed twelve basic factors that influenced retail trade territory and there is no reason why these other factors--such as lines of transportation, lines of communication, the class of consumer, density of population, etc.--could not be included in a modified version of the law itself.[43] For example, Paul Converse added an "inertia factor" which reflected the consumer's reluctance to move any distance in making a retail purchase.[44] Nevertheless, the major critics of Reilly's Law have objected to its overly simplistic approach and the fact that it ignores such factors as competition, store image or appearance, quality of stores, topography and man made factors which may make distance or parking irrelevant.[45] However, Reilly intended population to be an approximate summary variable for all those factors relevant to urban population creations; he himself saw urban congestion create conditions which repelled rather than attracted trade.[46] Most critics agree that the law's usefulness today is largely limited to smaller, relatively isolated towns, and that existing or proposed markets must represent the major retail drawing strength in them.[47]

One British public librarian has found Casey's modified form of Reilly's Law to

be quite useful in selecting sites for public library branches; he claims, however, that site selection is "no matter for the amateur enthusiast."[48] Interestingly enough, this is the only mention of the theory of site selection found in recent library literature. Perhaps failure to cite retail site selection literature does not indicate nonacquaintance with it, but it is amazing that site selection--of fundamental importance to the public library--does not appear to have been considered from a theoretical perspective, either independently or in terms of applicable geography or marketing theory. Instead, the library literature largely consists of "follow the leader" injunctions which suggest that librarians ought to locate near shopping centers, supermarkets, etc., because retail site selection is relatively effective and sophisticated, but little attempt has been made to analyze, relate and modify retail site selection theory or practice to library needs.

Although Reilly's Law of Retail Gravitation is the best known (and probably the only) theory of retail site selection to be considered a "law," there are several marketing theories which relate directly to site selection. Baumol has a theory of consumer shopping behavior which puts the probability of finding the article wanted and its distance into a formula with several subjective weights and some constraints.[49] This is a more sophisticated attempt at a law of retail gravitation and might well be used for the same purpose. The Theory of Cumulative Attraction states that a given number of stores dealing in the same merchandise will do more business if they are located adjacent to each other than if they are widely scattered.[50] Automobile rows and book store concentrations are good examples of this kind of clustering.

The Theory of Compatibility is somewhat similar to that of cumulative attraction; it states that:

> Two compatible businesses located in close proximity will show an increase in business volume directly proportionate to the incidence of total customer interchange between them, inversely proportionate to the ratio of the business volume of the larger store to the smaller store, and directly proportionate to the sum of the ratios of purposeful purchasing to total purchasing in each of the two stores.[51]

This has also been called the "contiguity effect": "a retail firm not only directly attracts consumers, but may increase its share of the market by locating near firms selling goods which consumers often buy on the same shopping trip."[52] Therefore, each retail establishment, including the library, must know which other retail establishments are most and least compatible with its own sales. These theories may be represented mathematically and both may be used in site selection and evaluation. White and Ellis have produced a model based on a systems theory framework which: (1) estimates the sales of a proposed store and how its sales might affect other stores in the system, (2) estimates sales sensitivity to changing store and traffic characteristics, and (3) describes the drawing power of a store in a system.[53] The model lends itself to computer simulation. Wilson provides the sophisticated reader with

a technical and quantitative discussion of several spatial interaction models for the utilization of services.[54]

The goal of this chapter has not been to give the reader a critical understanding of basic theories and laws, but rather to emphasize that relevant theoretical literature can aid comprehension of trends in site selection and evaluation of alternative sites for specific purposes. If we are to understand site utility, we must use and modify existing theories which will enable us to predict optimum locations for various types of libraries and various types of services. Traditionally, librarianship has been chastised for its empirical, pragmatic, and experience-laden bent. It is bad enough to have no theories of library site selection, but it is even worse to remain ignorant of the theoretical work in a related discipline.

SOME PRINCIPLES OF RETAIL SITE SELECTIONS

As more retailers use site-selection programs and as the experience of the larger retailing chains is collected and published, a number of principles are being discovered which simplify the selection of the right site. "Principle" is used here to denote "an accepted rule of action" other than a fundamental or general law. Reilly's Law is a good example of how a practical rule and a general law may be synonymous.

While retail site selection is not yet truly scientific, progress is being made. Applebaum is confident that its designation as a science, with a high level of prediction accuracy, is inevitable.[55] He provides us with an excellent and apparently valid discussion of the degree to which store location research is an art or science.[56] He claims that store location research is relatively recent and has been most used by chain stores. Store location research focuses on prediction of future sales on the basis of past sales at a similar or analogous site. Prediction tends to be most accurate when the new site varies little from the nearest analogs known to the research, and when the character of the new store is quite similar to the known store. Site selection principles are thus tied closely to the availability of performance records of existing stores, market factors, and consumer behavior. Unfortunately, site selection knowledge is not always shared by profit-making firms, little followup research is done to see if site selection predictions were accurate, and qualitative differences in stores, market area, and consumer behavior may make analogs distant indeed. Thus, site selection is like weather prediction, helpful but not always reliable.

Knowledge about site selection is currently available to make possible simulation, analysis and even selection by computer. For example, the Detroit News offers its advertisers computer-produced retail site analyses.[57] Certainly, in the near future we can expect a combination of retailing experience consensus and a sharpened theoretical perspective to result in computer-produced models of sites for various types of goods, which should both expand the

number of alternative sites open to the retailer and make the selection of the best site considerably more reliable. When this more sophisticated stage is reached, librarians should be informed and eager to take advantage of the knowledge "fall-out." The resulting data banks and methodology should be a powerful weapon in the fight for better library sites.

At the heart of both the theoretical and the pragmatic literature is a basic distinction between two different types of goods. Whether they are called high-order and low-order goods or shopping goods and convenience goods, the basic distinction permeates all of the literature: "It should be noted that classification of goods into orders has always been an intuitive and relative concept and no general classificatory scheme has been completed to date."[58] High-order or shopping goods are those items which have a relatively high cost, invite comparison, stress product differentiation, are grouped in high-order centers, are infrequently purchased, and have a considerable element of style to the merchandise--an automobile or a major appliance typifies this category. The other major category consists of the low-order or convenience good, which is characterized by low cost, frequent purchase, standardization, locational advantage, and little difference in style. The best examples of these are grocery items purchased each week, such as eggs, milk, and bread. The distinction between these two types of goods is basic because consumers shop quite differently for each of them and therefore different principles of site selection are necessary for each.

For obvious reasons, consumers do not have habitual shopping patterns for high-order goods. They will travel relatively long distances to purchase a high-order good because the transportation cost is so low compared to the price of the good itself.[59] The high cost also encourages considerable comparison shopping, and decisions to purchase a particular item usually involve the whole family. Recalling earlier remarks about accessibility thresholds, it is obvious that high-order goods will be sold in fewer locations; the store will need to draw upon a larger market area, will depend on consumers who drive to a site for particular items, and will be able to pay a higher rent than is true of the merchant dealing in low-order goods. Thus the concept of the high-order center is involved with that of high-order goods and services (obviously, people living near the center will need convenience goods, too). The evidence also indicates that high-order goods or specialty shops attract more customers when located in high-income than in low-income areas.[60] The image of a retail outlet is a function of merchandise, prices, services, personnel, and physical facilities. When the image is unique and favorable, the trade area is likely to extend notably.[61]

The shopping pattern for low-order goods is just the opposite. The usual pattern consists of a large number of short trips to familiar stores to buy familiar goods. Because these goods are frequently required, stores like supermarkets are located in so-called low-order centers which are close to individual neighborhoods and which maximize convenience and savings in transportation cost. Nearly 70 percent of people living in urban areas shop at food stores

within five blocks of their home.[62] The neighborhood orientation of convenience-good shopping means that there is a great amount of one-stop shopping. Decisions about purchases tend to be made on the basis of habit and impulse. Since the market area is relatively small and often homogeneous, considerable effort is usually made to orient products and services to neighborhood needs and desires, in contrast to the more cosmopolitan and heterogeneous setting of the high-order good store.

However, the trend toward ever larger supermarkets and shopping centers may diminish the distinction between these two types of goods, since both are found in a compromise location relatively close to the consumer. But this trend to larger and somewhat more distant locations may be offset by the rapid growth of the small neighborhood convenience grocery with its limited but basic stock reminiscent of the corner store originally forced out of business by the supermarket. There is a gray area where the two types of goods overlap. Some authorities believe that distinction between the two types is increasingly blurred and that this is reflected in the increasing number of nongrocery items found in most supermarkets.[63]

The basic question which librarians must answer is this: To what extent are library materials and services shopping goods, and to what extent are they convenience goods? We need to measure the consumer attraction and resistance of our libraries in terms of merchandise availability and accessibility. One such effort may be found in the Kansas City study done by Community Studies, where library materials were grouped in these categories.[64] For example, popular recreational titles are labeled convenience goods. Thus the central library reference center could serve as a shopping-good center for most patrons, and the neighborhood branch as the convenience-good retailing point with its emphasis on a basic collection of popular materials. The storefront or even deposit library then becomes the new neighborhood convenience store and the regional library becomes the shopping center. This may seem facile, but it is important that librarians analyze particular materials and services within this kind of grouping if we are to make valid decisions about appropriate sites. Grundt's research on branch library inadequacies moves in this direction and should encourage librarians to reexamine patterns of library site requirements.[65] The Tucson, Arizona, City-Planning Department suggests that following the emerging shopping district pattern would be far more relevant than the present centralized system.[66] Lowell Martin's 1957 Baltimore study is one of several which advocate a hierarchy of service points roughly comparable to central place theory.[67] The evidence would suggest that librarians have actually been making this kind of distinction for some time, but it is unclear how explicit or valid the decision has been, relative to contemporary site considerations.

Regardless of the order of the goods involved, research has clearly shown that the greater the number of selections offered by each location, the greater the consumer expectation that his trip will be successful. When factors desired in choosing stores are ranked, selection is usually first, followed by (1)

availability of sizes, (2) prices and values, (3) efficient and courteous staff, (4) store reputation for quality, (5) brand names available, (6) location, and (7) services.[68] It is interesting to note the low position of location among these factors. It follows that a consumer would then be willing to travel greater distances for goods or services as the selection available increases--he can then minimize his fixed costs by getting as much shopping done on each trip as possible. Sales then tend to increase as store size increases, but here, too, there is a tradeoff point. Perhaps this is why the following results are obtained when supermarket sales and profits are ranked (in declining order) by type of location: planned large shopping center, planned neighborhood center, freestanding main highway, unplanned large business center, unplanned neighborhood business center, isolated neighborhood location, and downtown areas in small towns.[69] Obviously, there is a cut-off point at which consumers will generally be unwilling to travel further even though probability of a successful trip might be increased. In fact, the tradeoff point seems to be moving toward convenience rather than toward selection. Some authorities believe that access to the store is frequently more important than the total package of goods and services offered.[70] Research is needed to locate the tradeoff point for different goods and services. Libraries need this kind of research, and even the well designed metropolitan library systems seem to have little knowledge of how far library patrons will travel if offered an increased variety of better materials and services.

The order of the good is usually assumed to delineate its market area. Studies are available, particularly those undertaken by the large supermarket chains and local newspapers, which give a detailed picture of the boundaries of market areas in communities throughout the United States. Libraries might find such studies useful, particularly if they hope to create natural rather than artificial (i.e., political) service areas. The largest boundaries of the market area are usually those of the circulation area of the dominant newspaper(s) in the community.[71] Newspaper advertisements are often the stimulus for high-order good shopping and may encourage certain patterns of low-order good shopping. Nearly all newspapers, as well as many radio and TV stations, have circulation studies available containing much information on the market which should be carefully studied by all librarians concerned with site selection. As Reilly's Law would indicate, it appears that within this large market area firms draw business with an intensity that decreases generally as distance from the store increases.[72] As indicated above, this principle is most valid for low-order goods, but there appear to be general time and distance limits for high-order goods also. Exact figures vary, but it is generally agreed that thirty minutes is usually the maximum time the average consumer will spend to reach a site, and in fact, fifteen minutes of driving time is usually the preferred maximum.[73] Stores appealing to walk-in clientele think in terms of one-third or one-half mile walking distance, although the comfort and attractiveness of the route may be more important than actual distance. Stated in terms of the order of the center, driving time limits would be: six minutes for the neighborhood store, fifteen minutes for the smaller shopping center, twenty minutes for the larger community center, and thirty min-

utes for the larger regional center.[74]

These figures are somewhat more generous than those used in library planning. The Tucson City-Planning Department among others, uses five to ten minutes as the maximum convenience zone for branch libraries; Lowell Martin used fifteen minutes for a regional library. Later, Martin suggested that the limit on the use of a district library was forty-five minutes or twenty miles.[75] In fact, many retailers assume that a consumer will not drive more than two miles for convenience goods. However, the consumer is not a homogeneous creature and general concepts may break down for particular groups of consumers.

One of the interesting areas of research in marketing has been consumer behavior; increasing knowledge about why, where, when, how, and who buys what is being acquired. Although consumer behavior can receive only limited attention here, some principles may be helpful in illuminating the kind of detailed knowledge which retailers utilize in selecting the most appropriate site. Consumer behavior is related to socioeconomic status, which in turn can often help to predict buying behavior. For example, emphasis on saving time, especially for convenience goods, increases as the consumer increases his standard of living.[76] Reliance on brands and advertising decreases as educational level increases. Wealthier consumers will travel farther to shop for low-order goods and prefer greater centrality in their shopping areas.[77] Homeowners and better educated people enjoy shopping less than do renters and less educated people. "Loyal" customers tend to belong to lower income groups and to live in rural areas, while the very disloyal live in densely populated areas and belong to upper-income groups.[78] To indicate the depth of market research in this area, it may be noted that packagers have discovered that a preference for subtle colors correlates with higher income and education, while a preference for brilliant colors correlates with illiteracy and poverty.[79]

Nevertheless, there are characteristics and behaviors which transcend economic status. For example, nearly all shoppers would prefer several specialty stores with greater variety to one large department store. They prefer low prices and poor help to high prices and good help. They dislike crowded stores, and crowds encourage a short shopping trip. Shopping attitudes become increasingly less favorable as shopping becomes more frequent and more routine.[80] The value of such customer knowledge in determination of the most appropriate site is substantial.

Although the nature of the goods and services being sold and the character of the consumer determine many important site characteristics, there are some principles of site selection which tend to be generally true. The cost of a site should be a function of its productivity. Similar or complementary retailers should be located near each other so that their cumulative attraction is strengthened. The best side of the street is the one which faces toward the greatest population growth, contains the most parking, and enjoys shade in the afternoon. Since shoppers move toward the dominant trading center,

the site should be near the largest generator, should be compatible with surrounding stores, and should be located on a street either leading to a major shopping center--the best drive-in site is within one block of an established shopping area--or, if in a center, on a path leading to the major store so that large amounts of traffic are generated without having to pay for the higher cost sites.[81] The location of future interceptors and the building plans of others are important since shoppers will not go through one trading center to get to another with relatively similar facilities.

For drive-in oriented retailers, traffic should be moving at no more than thirty to forty miles per hour and with a maximum of two lanes of traffic. The site should be either just before or after a stop sign or light which will slow traffic down. The ability (and legality) of crossovers is important, too, for they ordinarily account for a large number of consumers. A far corner site is preferred to a near corner site because of visibility and ease of access. Adequate frontage is important for any site which appeals to either drive-in or park and shop customers. Minimum frontage is 125 feet, but 300 feet is probably adequate, and a minimum depth of 125 feet is necessary to allow for adequate entrance, parking and exit. Identification by sign is important since the site must be seen in time to allow for a safe slowdown, turn-in, and parking.

Even here, however, some classification and categorizing may be necessary to determine the appropriateness of certain site selection criteria. For example, being told to locate in an interceptor position becomes more meaningful when we decide what kind of traffic produces the most consumers of particular goods and services. It must always be emphasized that traffic in and of itself is irrelevant. It is the traffic of potential and actual purchasers that is important. Different sites are appropriate for goods sold to consumers on different kinds of trips: goods bought on local trips, where shoppers tend to follow traditional traffic flow patterns, must be convenient to homes and intercept people engaged in daily errands; goods bought on work trips must be near major traffic arteries; and goods bought on recreational trips should be on major highways near such centers.[82]

Parking is another example of the relationship between general principles and the need to interpret in terms of specifics. It is generally true that the parking lot should be more visible than the store itself, that stores should face the direction from which most business will come, that all parking should be in front, that the 90-degree parking slot is best, and that each parking space should average 3.3 cars per day; the estimation of how much space need be devoted to parking is more difficult, however. An acceptable rule of thumb is that there should be about three times as much parking space as there is selling space.[83] The average car requires about 400 square feet of space, but Kane states that, depending on the walk-in trade, the ratio can range from no parking space to five square feet of parking space for every square foot of store space.[84] Determination of the area to be devoted to parking depends on such variables as: the size of the store and the type of merchandise sold;

the size of the trading area; the amount of walk-in business; the character, cost, frequency, and routes of public transport; road and highway access; incidence of automobile ownership; incidence of multiple shoppers; the characteristic, location and quantity of on-street parking; and the relationship between free and metered parking.[85]

PRACTICAL CONSIDERATIONS

Experts believe that location is of prime and overriding importance to retailers.[86] Howard Green believes that every retailer must ask two basic questions about site selection: "Where is the location with the best sales volume potential for the kind of merchandise we want to sell in this community?" and "What is the nearest suitable location to the optimum spot?"[87] It is easy for retailers (or librarians) to agree on the importance of location. In fact, there is a danger that location decisions may be perceived as too important to be left to librarians. Librarians may feel that they can leave such decisions to the experts, either by playing "follow the leader" and locating near successful stores and shopping centers, or by delegating this responsibility to outside experts. For example, Plovgaard has stated that: "In purchasing a site a useful principle will often be that those sites which interest banks and nationwide chain stores will be of equal interest as possible sites for the library."[88] It may be that librarians, like many retailers, are wrong in asking: Will this site be successful? instead of the essential: Where are the best sites for us.[89] It is important to get the best possible advice about alternate sites, but the librarian or some appropriate staff member must be intimately involved in site selection, and therefore knowledgeable about it if the unique needs and goals of the library are to be met.

What kinds of information might the retailer seek when he needs to evaluate alternative sites? This question should interest the librarian, since these elements are not readily available in the library literature and because it illustrates the complexities involved in site selection. Indications are illustrative rather than exhaustive, and again, it should be emphasized that the retailer's and the librarian's options may not be comparable. The retailer is not tied to sites by prior commitments or political boundaries. High purchase or rental cost may not be as inhibiting because site worth may quickly recapture initial costs through increased sales and profits. The retailer, who often rents, may also be able to move from an undesirable site with less effort. Nevertheless, the retailer's universe of possible sites is limited. For the library, the small universe of "appropriate" sites may be a real problem. There may be considerable pressure to locate on city-owned property, particularly in a park or civic center. Wheeler has been the great fighter in this battle and all librarians should be grateful. We are not out of the woods yet, but we need to do a better job of fighting the next battle--of maximizing the number of alternative sites and making an intelligent selection among them. This will be difficult because of the library's financial problems, its status as a governmental institution, and

because of traditional long-range attachments to sites. Ralph Munn is the major proponent of a rent-not-buy philosophy, which may increase initial flexibility and responsiveness to environmental change.

It may be helpful here to introduce the classes normally used to categorize retail structure. Stores fall into three types of development: the center, ribbons (on both sides of a street or highway), and specialized areas. Centers, either planned or unplanned, may be of five kinds: convenience, neighborhood, community, regional and metropolitan. Ribbons may be of four types: the traditional shopping street, the urban arterial, the new suburban ribbon, and the highway-oriented ribbon. Specialized areas are usually self-explanatory, but the automobile row or theater district is probably the most frequent example of locating specialty stores in a cluster.[90] Mertes uses another approach when he labels sites as internal, axial, pivotal, peripheral, or external. The internal site is within the central business district (CBD). The axial strip is along major thoroughfares leading from the CBD to residential areas. The pivotal site is similar to the axial except that it is located at the confluence of two or more major thoroughfares. Peripheral sites are on the edge of the community, often adjacent to interchange or access roads. The external site is along a high-volume traffic artery in the hinterland between communities.[91] Retail stores may also be classified into types using other classification schemes. For example, Schell places stores into these groups: conversion to nonretail use, retail slum, nonshopper-oriented services and bulk goods, auto traffic-oriented, food and drink, mutually oriented conveniences, neighborhood convenience goods, independent shopper-oriented services, secondary shopping goods, primary shopping goods, and recreation.[92]

GOALS

Libraries should state their store location objectives as specifically as possible in terms of desired service area, characteristics of patrons, desired inputs, minimum outputs and (tentative) maximum costs. Excellent outlines for a site location analysis may be found in Applebaum and Zaloudek.[93] With an explicit statement of objectives, the librarian should be able to focus on those aspects of site location which are most relevant, and the statement of objectives should give him or her the criteria necessary to evaluate the relative utility of various sites. Site location planning is difficult because it implies an accurate forecast of future business. Well-chosen objectives provide the site selection process with a focus which makes forecasting easier. Specific, operational objectives are the sine qua non of the site selection process.

Objectives will then need to be converted into a store/library strategy plan. This plan will be modified or adapted as current information, market analysis and information on available sites are received. As Green indicates, selection of a site "must be evaluated in the light of a clear concept of the market segment the firm appeals to, the merchandise it will offer, at what price

and in what assortment and depth."[94]

INFORMATION SOURCES

Maps are basic to any understanding of place relationships, and the site selector should spend considerable time becoming familiar with the wide variety of maps available, beginning with detailed street maps. Existing land use and zoning maps are helpful in establishing patterns of land use. Maps published by city, county, and regional planning agencies should indicate likely future use. Traffic maps show how streets are utilized. Topographic maps show natural transportation barriers as well as information helpful in determining economic and social development. Population distribution maps identify residential areas and may also indicate areas of anticipated population growth. Street maps and directories often contain current information on traffic patterns as well as incidental economic and population data. Aerial photographs offer the most current source of cartographic information and may have information not found elsewhere. The Sanborn Map Company's fire insurance atlases offer a detailed, building-by-building indication of land utilization. An excellent and quite detailed paper on the use of maps in store location research may be found in an article by Applebaum and Schell.[95] Maps are particularly useful in combination with consumer interviewing where they indicate quickly and with impact the primary trade area (that geographical area where 45 to 75 percent of customers live) and secondary trade area (that area where between 20 and 45 percent of customers live).[96] Once these trade areas have been established, other, more specialized maps become useful.

Census material offers the best and most detailed social and economic information on larger urban concentrations. It is probably the best beginning place for statistical information when supplemented by appropriate federal, regional, state and local government documents and publications, which update the usually dated census information.

Local government and business organizations and nonprofit agencies generally have substantial relevant information available in reports and studies. A checklist of local organizations and contact persons should be prepared. For example, the following might be contacted: city, county, and state governmental agencies concerned with utilities, fire and police protection, health and welfare, housing and zoning, education, planning, traffic and parking, taxes; public utilities and transportation companies; welfare agencies; colleges and universities, especially those departments concerned with business and communication research; local mass media; business organizations, especially the realtors group and the chamber of commerce; marketing research firms, as well as those that compile city directories, local maps, etc. Libraries will also wish to identify the resources and location of other educational and cultural agencies within the community. Appropriate officials should be contacted and interviewed regarding specific informational needs. For example, both the city engineer and the local outdoor advertising concerns will probably

have detailed traffic flow maps available.

Interviews of patrons and other retailers are usually necessary when gathering information about consumer habits and attitudes. Organizational records should be evaluated to benefit from previous experience with site selection.

INFORMATION NEEDED

Population distribution, characteristics and changes are of basic importance in the process of choosing a site because they tell us where present and future customers live. Remember that sites are selected in the present for use in the future. Site selection includes prediction, and the site selector needs information about the future community in particular. Identification and analysis of trends are especially important; expect change and look for it. (Some authorities call this aspect the "customer distribution survey.") The retailer seeks first to identify his trading area and then to characterize the population within it. An interesting example of a library's identification of its trading area may be found in a study undertaken by the Southhampton, England, Public Libraries, which surveyed and mapped geographical distribution of users for each library outlet.[97] We need to know how many people live where, not only in terms of number, composition and density, but also in terms of categories such as gender, age and ethnic group. A customer may be male or female, child or adult, alone or with his family; these characteristics need to be identified and related to the way in which people shop. We are concerned with urban and regional population growth, both natural and by annexation. The location, nature and amount of residential construction activity is also important. We need to know the number of households in each area and the number and type of dwelling units constructed, as well as the rate of construction. Special attention must be given to seasonal population changes as well as to people living in institutions such as hospitals, military posts or colleges. Growth and decay in residential areas and reasons for it are of particular concern. Since users and nonusers of library services and materials differ notably in terms of population characteristics, the librarian will be interested in identifying those characteristics which relate to library use and the location of people with those characteristics.

Appropriate economic factors should also be considered. The economic base of the community should be identified and analyzed in terms of stability and growth potential. Office space concentrations and new office space construction are important to the retailer concerned with dense pedestrian traffic. Income level and distribution is of fundamental importance since the amount and distribution of retail facilities are most closely related to the amount and distribution of consumer income. If available, information on consumer expenditures and buying habits is even more useful. Here, too, we need to consider potential change and future trends.

As Epstein has pointed out, "perhaps the most serious barrier to consider in

site evaluations is the 'side of town' (the general land use and settlement associations)."[98] Even a unique or monopolistic business like the public library will have difficulty attracting customers to a site associated with a deteriorating business area or one with undesirable environmental characteristics. The site selector must determine the several groups, trends and characteristics likely to be associated with areas within the community and specific sites. Negative psychological associations with a site will create a sense of risk which will inhibit potential customers.

Characteristics of retailing require in-depth examination. An important step in this stage of analysis is to appraise the adequacy of existing facilities and locations. Which are most and least adequate? Why? The site selector needs to consider the site location needs of the total system; i.e., there must be a site selection strategy rather than a series of tactical plans. Where are the new (and old) major shopping centers or districts and the "big draw" stores; what are their characteristics, sizes and arrangements? Epstein notes that there is an important psychological dimension to site compatibility. It is of some importance to isolate the "growth side" of a business center and community and then locate sites within the growth area. Psycholgically, both newness and growth have favorable connotations. "Compatibility" refers not only to various trading areas, but also to immediate neighbors. Is neighboring property being used in a manner compatible with the proposed new building site? Will neighboring firms, agencies and institutions attract large numbers of people who may then patronize the new retail site?

To illustrate a more detailed level of concerns using shopping center location as an example, we might ask, as Mertes suggests:

> Who is the developer? How long has he been in the business? What are his financial resources? Where did he get his financing? What kind of a reputation does he have? Has he developed other centers? What is their record? Who is the economic consultant? What is his reputation? Who is the architect and what is his reputation? Who is the builder and what is his reputation? Who will manage the center and what experience does he have? What are the leasing provisions? Is the parking area at least three times the selling area? Does the shopper have to walk more than 350 feet to the store from the parking area? Are parking spaces angled at 90 degrees? Will the planned car turnover be more than 3 cars per parking place per day? Does the parking area adequately distribute cars over the entire area? Are there enough ingress and egress roads to the parking area? Is the center large enough to forestall construction of similar competitive centers? Is the site at least 400 feet deep? Does the center face North or East? Can it be seen from a distance? Is the site a complete unit? Are all stores readily accessible to each other?[100]

Heald found that six variables explained nearly 90 percent of the variation in turnover among stores: selling area in square feet; the number of "key traders"--leading stores who tend to pull trade into a shopping center; percentage of upper-middle-class population; ease of car parking; number of competitors in the vicinity; and population of trading area. He then suggests that potential sites can be evaluated on the basis of the last five variables.[101] Sites selected by competitors need to be closely analyzed in terms of sales, success, size, market area, etc. What are the per capita sales figures for various convenience and shopping goods? We need to locate, categorize, and evaluate the success of different types of retail trade. What kinds seem to be showing the most growth and where are they locating? Which of these generate the most traffic? This is especially important for libraries if Wheeler is correct in his belief that most library use is in connection with downtown errands or business.[102] Where do vacancies--which indicate the retail weakness of an area--occur? How close to saturation are various markets? Retailers use the terms "underpenetration" and "overpenetration" to characterize those parts of the trade area which are not presently served, are served inadequately, or are overserved. Thus, the librarian locating patron's homes on maps will need to identify areas of underpenetration which offer sufficient "sales" potential for a new site.[103] What kinds of stores are business failures and where are they located? Which kinds of stores seem to be associated, and where are they? What are the market areas for different types of stores? (This is where checking license plates is often helpful.)[104]

The importance of traffic flow and geographic accessibility and convenience has been discussed above. The site selector is looking for a "trapping point," a location where inducements to enter the retail site are maximized.[105] How many people walk/ride/drive to various shopping areas? It is frequently useful to characterize or rank sites as automobile-dependent or pedestrian-dependent.[106] Appropriate traffic variables can then be considered and weighed. Which streets are most heavily traveled and when? How long does it take to get from various areas to alternative sites? Which streets are used for going from home to work, shopping, and traffic trips? What changes and new construction are planned for the future? How will they affect present traffic flow? Where and when do traffic bottlenecks occur? Which areas and stores are traffic generators and where are they located? Where is off- and on-street parking located? Where are public transportation routes located and what is the schedule? Alternative sites should be considered in terms of specific traffic characteristics. Look for fast-moving traffic or congestion. Do signals and signs encourage or prevent convenient automobile access to the site? Do curves or grades limit visibility and make turning into the site difficult? Can drivers cross over from the other lane? Is frontage adequate for access? Is parking adequate for peak hour use? Is there a drive-around exit?[107] We need to remember, too, that barriers to the smooth flow of traffic, ease of access and exit, etc., create substantial and negative psychological associations for particular sites.[108] Accessibility is the key and it is a function of the amount of time and the inconvenience involved in reaching a given site.

Consumer habits and attitudes are probably difficult to identify without extensive interviewing, but we need to know consumers' likes and dislikes as well as where and how much money they spend for which goods and services.

Physical characteristics are also important. Size and shape of property affect cost and usable space. Earthmoving can be costly and create long-term problems for the building. Subsurface characteristics may necessitate special and expensive foundation work. Property with an existing building, unless adaptable, may involve expensive demolition costs. Utilities (roads, water, sewers, etc.) must be adequate and available at reasonable cost; for example, natural gas service may be unobtainable due to a shortage, or utility hookup may be quite expensive. Direct accessibility to the site is probably the single most important physical site attribute.[109] For example, the placement of curb cuts, median strips and the like can make a site either easy or impossible to enter. In many cases, local governmental agencies can make consequential decisions concerning physical characteristics; relevant regulations and policies must be explicitly identified and related to the various sites. Both zoning laws and building codes will influence site utilization and need to be carefully examined since they can bring on substantial and unexpected costs.

The site selector must attempt to identify and record a cost for each site being considered. Such costs might include the following: land, building for the particular site, utilities, surveys, consultants required, likely depreciation, insurance for the site, and maintenance. As Epstein says, "all site factors that can be given a dollar value translate into occupancy cost. Computations and evaluations can be made with relative ease and certainly on a short-range basis."[110] Costs and cost factors produce tangible evidence for site evaluation.

ORGANIZE DATA

We are interested in classifying and tabulating data in order to compare the characteristics of various areas--and sites near them--to locate trends or changes in their composition or character. The latter is most important because choice of a site involves a commitment to remain at a given place for several years. While the retailer is interested in serving present needs, continuing business success is based upon serving future patrons. It may be useful to organize data into tables or cartograms to facilitate comparison and decision-making.

Zaloudek argues that the key to successful site selection is the use of a strategy within the market area and the avoidance of selection on an ad hoc basis. He then suggests that the following steps should be taken at this stage of the site selection or appraisal process:

1. Identify and delimit likely market areas, place them on a detailed street map and number each area.

2. From the geographic, economic population, and other data available, select those most relevant, and tabulate them for each market area identified.

3. By dividing gross expenditures by population and families, per capita and family spending potentials by merchandise category or state type can be created. If this information is related to each market or area, those areas with the most potential can be identified.

4. Maps of these market areas of particular interest should then have major business generators--housing developments, large employers, shopping centers, etc.--superimposed on them.

5. Through continuing comparison of tabulated data and of geographic data on maps, the site selector is able to reduce the number of potential sites to those in a few market areas which have the most potential, i.e., a long viable economic life.[111]

Needless to say, the most difficult aspect of this phase is not capturing data about the contemporary market area--although that requires patience and much "digging"--but rather is attempting to forecast anticipated future changes within market areas.

Now the focus shifts from markets, tracts and neighborhoods to the search for specific sites with specific areas. Depending on objectives, the site selector may be looking for sites with immediate, near-term, or future retailing potential.[112] Obviously, the criteria for each may vary. Within desired areas, the site selector focuses on the characteristics discussed above, especially the identification of firms, centers and developments most likely to attract large numbers of potential customers.[113] From this process, likely sites can be identified, perhaps in a three-block area. The site selector then travels each major street near the location and notes information about it. With the use of a standardized form, each potential location can be described and evaluated for comparison and ranking purposes.

Individual sites may then be characterized in terms of their visibility, frontage, access, position on the street, layout, and retail linkages. For example, a variable such as site visibility could be evaluated on an excellent/poor scale with weighted points attached to both the variable and the available values.[114] In this manner, an overall point score can be assigned to each site. Obviously, such scoring requires operational definitions and explicit decision rules, but it can give the site appraisal greater objectivity and effectiveness.

"After organizing, classifying and spotting potential locations on the 'master' map, begin to contact real estate brokers regarding information on alternative sites in chosen locations."[115] Here, cost and availability information will further reduce available sites. Finally, a few sites will be selected and ranked; the final site selection may then be made with ranked alternative sites available.

Thus, infinite locational possibilities are narrowed down to a few sound sites from which a final decision may be made. Through the use of various sales forecasting and simulation techniques, these select sites should be compared in terms of specific inputs and outputs particularly in regard to utility to the consumer so that tentative sales volume, cost, and profit figures may be generated.[116]

ANALYZE DATA

The report of the data is as important as the decision itself, since it is the impetus toward action by the parent body. The report does not need to be a glossy handout, but it does need to be well organized with clearly written summary statements which relate institutional goals to the decision made; it should also include enough community data to indicate why certain assumptions and decisions were made. The written report should include some detailed information about ranked alternative sites so that a new decision may be considered if, for some reason, the first choice cannot be approved.

Librarians may feel that because of their dependence upon other municipal departments and boards, financial difficulties, understaffing, etc., a program similar to the one suggested here is wholly unrealistic. Certainly site selection programs are circumscribed by unique local needs and problems, but there must be a program; if it is a limited one, it should be because alternatives were considered and rejected and not because of a lack of effort. Unlike retailers or other institutions, libraries should already have both the information sources and trained personnel knowledgeable in their use so necessary for a site selection program.

CHANGING PATTERNS

Successful retailing demands attention to new trends and developments, because future customers are as important as present ones. Much of the material previously discussed concerned change and innovation. The application of rigorous approaches toward site selection is only about fifty years old and most of the principles mentioned above are the result of research during the last two decades. Yet even though many retailers have been responsive to change, Berry argues that the nature of retailing is changing so rapidly that the entire commercial structure of American cities is obsolete.[117]

One result of this kind of instability is increased interest in renting rather than owning sites and buildings. Changes such as those mentioned below may turn successful sites into unsuccessful ones in only a few years. Mertes persuasively states the case for renting: "So many conditions may change within a decade or so that real estate investments may become prohibitive to the retailer of any size."[118] Banks and public utilities have traditionally leased branch offices. Then too, retail facilities tend to become obsolete after

about ten years. On the average, commercial buildings are demolished and replaced at the end of two generations of use.[119] This is quite a contrast to the librarian's long-range commitment. The Philadelphia Free Library study suggests that library buildings are designed to be used for fifty or more years.[120] Chitwood's statement that "the library has to be more than convenient to users; it has to be in a location where potential patrons will stumble over it"[121] suggests that the public library must be free to follow changing trends in shopping behavior. Renting under lease may give the retailer more flexibility in the future as well as reducing initial demand for capital.

The most obvious indication of change has been the growth of suburban shopping centers and the decline of the central business district. These two developments will be discussed later, but it is obvious that there are other trends and developments which may alter the principles of site selection. The purpose of this chapter is to survey some of these trends.

Before we discuss individual trends, we should note that although they may sometimes appear unrelated, such changes do have a cumulative effect which can already be observed. Brian Berry's comments are representative:

> Changing store types, changing buying patterns, increasing mobility, improved transportation facilities, and rising income levels all exert pressures in the same direction: to larger stores serving larger trade areas, to centralization of retail facilities in fewer, larger centers, and to the elimination of centers of the lower level.[122]

In the appropriate nomenclature, this means a general shift in the retail structure toward the higher order center. The most striking example of this shift is the replacement of the old multiunit neighborhood shopping center by one or two all-purpose stores and the rapid growth of community and regional shopping centers.[123] At the same time, there is a shift from the highest level center, the central business district, to lower level centers. Merchandising changes also encourage the trend toward larger stores: traditional merchandise lines have been expanded, new self-service and display merchandising allow goods to sell themselves--although they also demand much more display area--and there is increased recognition of the importance of impulse buying.[124] The reader will nevertheless recall earlier remarks about consumer resistance to driving greater distances even when the selection of goods and services was substantially larger. Thus, some trends may contradict this unidirectional movement toward size. One difficulty in the discussion of trends is that they may have changed by the time that they are in print, but anyone concerned with site selection must be current if he is to select a site which will be profitable in the future. For example, the trend toward greater size is weakest in low-income areas where there is still a substantial demand for small general stores to serve local needs.[125] If most library users are children, who walk or ride bicycles to the library, some studies indicate that they account for about 75 percent of all library patrons, and small neighbor-

hood branches may retain their utility regardless of retailing trends.[126]

The obvious trend toward larger and fewer retail outlets which are beter integrated in terms of goods and services offered and more accessible by transportation from work, play, and residential areas should present problems to local merchants by reducing alternative sites and altering present shopping patterns.[127] Yet this may be offset by the same sort of trade-off between selection and convenience which has encouraged the development of the new neighborhood convenience grocery store with its small basic stock which reverses the larger trend toward crossing of merchandise lines. Pressures toward bigness create both a threat and an opportunity for the small, independent merchant who, more than ever, needs full and detailed information if he is to select the site which will maximize profit opportunities in a turbulent future.

The great revolution in transportation which challenged Reilly to develop his famous Law of Retail Gravitation is still very much with us. In fact, it is responsible for some of the most dramatic trends in retailing today. Although the increasing cost of gasoline may cause a reversal, the proportion of customers arriving at stores by public transport declines as the tendency to make all shopping trips by automobile increases. Walk-in pedestrian traffic is now largely restricted to the street-corner store, often open long hours and located in the most densely populated part of the city. Pedestrian-oriented neighborhood and ribbon developments are on the decline, while larger units on major traffic arteries increase.[128] Emphasis on parking, automobile access, and street congestion has become a primary concern of all retailers.

It is interesting that Wheeler believed that parking is relatively unimportant and that most people would not use the library more if more parking was available.[129] However, to say that the library should be where the parking is most difficult because that is where the largest number will see and pass it confuses gross traffic with consumers and contradicts the findings of market research, which indicate that most shoppers are discouraged by crowds and congestion.[130] There seems to be equal error in limiting library patrons to the decreasing number of people who work and shop downtown. Wheeler also appears to believe that the library has no responsibility to provide parking for its patrons. Martin, however, represents a more accepted opinion when he states that parking facilities are essential.[131]

Increased mobility has lessened the need for clustering establishments in business centers and added substantially to the number of appropriate alternative sites. In contrast to the trend toward the large one-stop store or center, Berry[132] and Simmons[133] believe that increased mobility will encourage customers to make trips for specific rather than combinations of purposes. Mertes suggests that the greatest opportunity in retailing lies with the drive-in site.[134]

In terms of low- and high-order goods, organization of retailing in terms of

minimizing transportation time should be satisfactory for low-order activity, but less and less so for higher order goods. One interesting example of a library site which minimized transportation cost to the patron was that of a minibranch established in Cleveland's Union Terminal building to provide reading materials for commuters.[135] In fact, as traffic congestion becomes a greater problem in all urban areas, the freestanding site may take on added importance. The halting and expensive progress of new or revitalized rapid transit systems in Atlanta, San Francisco and Los Angeles seems to indicate that the age of the automobile is far from past and that the problems of congestion and parking will become increasingly relevant to site selection.

Comparison shopping is often done in the home by browsing in the media rather than by window shopping. The aggressive merchant counters this trend by selecting a site which will encourage family shopping and which will build upon such trends as: fewer shopping trips; increased male and family participation in shopping; concentrated weekend shopping; the growing importance of evening shopping; more informal shopping; and increased reliance on drive-in facilities.[136] Because convenience is an important element in nearly every aspect of daily life, site selectors must renew their emphasis on thoughtful analysis of the literature and on market research if they are to find that site which takes advantage of the trade-off between convenience and mobility. It is this combination which has resulted in big retail centers and specialized freestanding sites.

Patterns of site selection are also affected by changes in consumer spending. During the past few years of inflation and recession, there has been a considerable change in the relationship between the amount of consumer income spent on low- and high-order goods. The proportion of money spent on essentials like gasoline, rent, and food has increased, while there has been a decrease in the amount spent for more expensive, more optional higher goods. If this shift to low-order goods continues, the consumer's interest may focus more and more on goods which have a convenience rather than a selection orientation. Retailers might find it profitable to locate near merchants selling goods and services for which the relative demand appears to be increasing. Conversely, location near merchants selling goods and services for which relative demand appears to be decreasing could result in fewer prospects and lower profits <u>if</u> business does not depend on customers making a specific trip to that store alone.

The changing relationship between goods and services might also affect site requirements. There has been a relative decline over the past two decades in the purchase of goods and an increase in the purchase of services. Thus, locating near merchants offering services might help to secure an adequate number of customers. This is a corollary of a principle mentioned above: locate near the store which will generate the largest amount of traffic. The terms "inferior" and "superior" goods may be used in this regard. Goods whose sales increase more than proportionately as consumer income increases are considered superior; inferior goods have a negative income elasticity. It is important

for libraries to consider these trends, because most librarians believe that people use the library only as part of a combination trip and do not make specific trips to the library. Wheeler has stated this most notably, but the view is widely echoed in the library site literature. The retailer or the librarian seeking the most appropriate site for attracting future customers must research trends and developments in consumer spending and attitudes.

THE CENTRAL BUSINESS DISTRICT

Of all the trends and developments which have affected retail site selection, perhaps the most important is the decline of the central business district (CBD). Our theoretical discussion began with central place theory, in which the central business district stood at the hub of the regional retail trade structure. Today the CBD is beset by many problems and the once universally favored downtown site, whose value to retailers could easily be seen in terms of high property values and rents, is no longer attractive to many retailers. Vacancies are the best indication of this problem. This chapter will present a brief survey of what has happened, is now happening and probably will happen to the central business district. The immediate impact on retail site selection is obvious, particularly to librarians who remain committed to the downtown site either by conviction or by circumstance. Traditionally, site selection for the main library has been firmly rooted in the CBD. Literature on the subject reflects this belief: "A downtown, pedestrian-oriented location in the thick of things is the most important consideration affecting the use of the public library."[137] An interesting case study on locating the central library in the CBD may be found in Green's work, which also includes a good summary of appropriate library literature.[138] Unlike the retailer, librarians may not be able to leave the central city regardless of how unpleasant and unprofitable it may become. The location of a central library facility which serves a region should nevertheless take account of recent developments. As downtown merchants have already discovered, hope for federally encouraged revitalization of the CBD is no substitute for customers.

Although the term is frequently used, "central business district" has no commonly accepted meaning. Usually, CBD is defined in general terms which allude to the heart of the retail sales of the city, central location, and higher order goods. Theoretically at least, the central business district is uniquely accessible to the entire city population.[139] The downtown area is divided into two parts: the core and the frame. The core, which is usually equivalent to the central business district, is an area of about eight square blocks, devoted to "people, paperwork, and parcels."[140] It includes the area where population density is the greatest and space is used for either offices or retail trade. The characteristics of the core are: (1) intensive land use, (2) an extended vertical scale, (3) limited horizontal scale and change, (4) concentrated daytime population, (5) focus of intracity transportation, (6) center of specialized functions, and (7) internally conditioned boundaries. The frame consists of the area in the circle immediately outside the core.

The characteristics of the frame are: (1) semi-intensive land use, (2) prominent functional subregions, (3) extended horizontal scale, (4) unlinked functional subregions, and (5) externally conditioned boundaries (usually by geographical or political factors). Remarks which follow will usually be in terms of the central business district, but the reader should remember that this phrase is often used ambiguously to include both core and frame.

The development of the great downtown stores was made possible by the creation of efficient, low-cost public transportation. At about the time buses and automobiles began to replace street cars and interurban cars, the monopoly of the downtown area on concentrated shopping traffic began to break down. Originally, the central location minimized transportation costs,[141] but today transportation clearly favors the suburban site. Centrality is no longer synonymous with accessibility. The effect on retailing is immediate: "We are asking the customer to pay a penalty to visit the downtown store--either to use the mass transit system which she has voted against (and prefers not to use) or to use an automobile in an environment which cannot comfortably accommodate it."[142]

Many merchants view the automobile problem as primarily one of parking and opening up more parking space near their stores. However, the more difficult problem concerns automobile access and traffic congestion. Weiss argues that this congestion is evidence that more adults are "downtown in larger numbers than ever before in the long history" of the city core.[143] The problem, according to Weiss, is not lack of traffic but how "to persuade more of the human traffic to do more shopping while downtown." He then suggests that specialty stores are most likely to do this, particularly in their appeal to office workers. Traffic is a problem which can be solved only on a much higher level, and with a considerable degree of intergovernmental cooperation. Many firms have partially solved the problem by relocating from the core to the frame, where freeways are less crowded and provide quicker access, and where more parking is available at lower cost. What effect freeways and tollways have on the central business district has received some critical attention, but no discernible correlation has been found between the level of CBD sales and the degree of highway development.[144] The questions of how important transient traffic and business is to different goods and services, and how the automobile revolution and resulting congestion has affected the profitability of downtown sites, remain unanswered. The decline of rail transportation and the need to locate airports in the city outskirts, coupled with the great increase in interurban automobile traffic which often goes around the central city, resulted in fewer transients in either the core or the frame. The failure of the public to support effective rapid transit--presently used largely by the poor and ethnic groups--seems to indicate that the transportation problem will not change notably in the future, even with higher gasoline prices.

Aside from the transportation problem, the most vexing problem facing the central business district is that of changing population. Major cities are rapidly becoming ghettos for disadvantaged socioeconomic groups. The effect on

retailing is obvious, since middle-class whites do not like to shop with the poor, especially if they are black.[145] Given the composition of library patrons--middle- and upper-class whites, housewives, and students--the CBD location may have a similar effect on library use. Large concentrations of the poor near the central business district threaten the prestige of the district and its member stores. Crime and violence is also an issue of importance. An increasing number of middle- and upper-class Americans are afraid to shop downtown, particularly at night. The population change becomes self-reinforcing. When this situation is coupled with a retailing revolution which brings fine new stores with a substantial variety of goods and services to the suburbs, where most middle-class consumers live, a situation obtains in which downtown retail sites may be forced to orient themselves to the black, the immigrant, the unmarried, and the aged.[146]

Declining population in the central city and the replacement of higher by lower income groups threatens traditional higher order functions and illustrates the difficulty of applying central place theory to contemporary retail structure. What this kind of population shift can mean to the value of retail sites is illustrated by an example from Chicago, where social turnover from a white middle-class population to a black lower-class population was accompanied by a 30 percent drop in income levels (in the decade between initial penetration and the time when the area had become completely black), which implies a decline of retail stores during the decade of at least 2.5 percent per year.[147]

However, it is the psychological impact of change upon white shoppers which is probably as important as the actual change itself. McKelvey speaks of this psychological dimension:

> The large U.S. city must be humanized at least to the point where it does not dehumanize those who live and work in a downtown trapped in seemingly endless stackings of little boxes ingeniously contrived for people to "be alone in." If this is not done soon, the so-called civilized cosmopolitan man will be gradually destroyed in the daytime frustrations of confusion, unfair competition, traffic conflict, and noise, while night-time terrors seethe. [148]

The growing concern with urban crime and violence explains the reluctance of the retailer to invest in a downtown site. Making downtown sites safe for high-order functions will surely require a massive infusion of state and federal funds. Most difficult of all, however, will be a change in attitude by the white middle-income group which comprises the great majority of the U.S. population. Surely these kinds of attitudes and pressures are equally true for people who use our central libraries. We must balance our obligation to provide appropriate service to inner-city patrons with that of locating central facilities in an area which will be most attractive for the majority of its patrons--who are from the white middle-income group.

With all these problems, the reader might wonder why consumers continue to shop downtown. Perhaps the greatest asset of the downtown store is the reputation and goodwill which it has built up over the years. Regardless of present difficulties, many consumers still believe that they will find a better assortment and variety of goods and services downtown, that prices are often lower, and that goods are of better quality. Although this may indicate a long-range problem, higher income groups continue to patronize the city center more than lower income groups and this helps the downtown "class" stores to maintain their image.[149] Studies have also shown that older consumers prefer the central city more than do the younger, that more females prefer downtown than do males (the crime problem may change this), and that professionals prefer downtown more than do skilled workers. Thus, there still seems to be an opportunity for merchants to emphasize class or specialty goods which draw from a large surrounding hinterland in more traditional central place terms. Although difficult to generalize, many customers still have favorable attitudes toward downtown shopping. There are many more shops in the downtown area and the fact that the average unit is much smaller than those in the shopping center can be an asset if used to emphasize specialty goods and specialized, personalized service not found in shopping centers.[150] In fact, the literature continues to emphasize that the opportunity for specialized and comparison shopping is the chief advantage of the CBD.[151] However, the larger shopping centers are increasingly challenging this advantage. Specialty shops catering to office workers or to tenants of some of the luxury apartments being built near the CBD in larger cities appear to be the most likely to continue profitably in the CBD.

What will happen in the future? Can downtown merchants, city planners, and the rest succeed in revitalizing the central business district and reverse the steady flow of business to the suburban shopping center? The answers are cloudy, but certain trends are evident: "Neither the growth of competing retail outlets nor the detrimental trend in population and employment has been halted."[152] The actual extent of this trend is still vigorously debated, and some argue that the decline may not be nearly as severe as it is often portrayed,[153] but the central business district is limited physically and can no longer expand horizontally. In the post-war period, virtually all growth in the commercial structure has taken place outside of the city core.[154] George Sternlieb has given us an apt summary of the negative trends which affect the downtown site: "The orientation of consumers to the automobile, the degeneration of our cities, competition from new forms of retailing, and adherence to outmoded methods of doing business have, in many instances, made downtown operations marginal at best."[155]

Suburban retail sales have increased more rapidly that have central city retail sales. In Chicago, the period between 1946 and 1959 saw city population decline about 6 percent while downtown employment fell 17 percent and the number of peak half-hour shoppers declined 42 percent.[156] Yet there are hopeful signs, too. The downtown area remains the focal point for governmental activities, leading financial institutions, and large commercial enterprises. There

has been a general increase in office space in the central district; it now accounts for nearly one-third of the total commercial floor space in the central business district core. Downtown merchants remain concerned about the possibility of decentralization of office space because of employee dissatisfaction with transportation problems.

One of the difficulties of the retail sector of the central business district--which has accounted for about 30 percent of the nonresidential floorspace in the core--has been a snowball effect which results when a large retail unit becomes vacant. Isolated stores are most susceptible to vacancy and stores which are clustered retain considerable strength.[157] If the store which draws the most traffic to the area pulls out, traffic immediately declines and a reverse catalyst sets in which may eventually destroy the entire area. Since many companies lack the funds to rehabilitate their downtown facility and to permit branch expansion, there is a natural tendency to sacrifice the downtown site for the more profitable growth site in the suburbs.[158] The source of future strength for the downtown site depends on the ability of retailers to condense their facilities so that the surviving institutions can afford to refurbish themselves.

Vance's pioneering study appears to indicate a fundamental distinction between mass and specialty retailing. For mass appeal goods, the former market hinterland of the central business district has been divided up "by spatial competition among competing regional shopping centers and the central business district supplies such goods only to inner city."[159] What could not be decentralized was trade in specialty goods which still needed the central location which the core provided--to tap the entire metropolitan market. Therefore, the future will probably see a revitalized downtown retail section where a few stores supply convenience goods to those living and working in the central city, but with specialty stores which will draw "widely but narrowly in contrast to the suburban shopping center which draws narrowly but as completely as possible."[160] Thus, mass and specialty retailing may be geographically separate in the central city and the suburban area. Vance predicts the development of a separate central office area and a separate metropolitan specialty district removed from the great traffic congestion of the office area. The CBD would then continue to exist as a center for offices, and specialty retailing would probably be located in the frame.[161]

This shift from the core to the frame might be a solution to some of the problems of the downtown site for the central library. The Tucson library plan advocates relocation of the central library from the CBD to somewhere in the frame.[162] Although contrary to Wheeler dicta, this might represent a sensible step for other public libraries who wish to increase accessibility without losing centrality. Ward's study of the Fullerton library suggests the same approach for a medium-sized town and becomes more generally applicable as California's automobile orientation becomes more typical.[163] Thompson suggests that the frame offers the central library administrative and technical services an opportunity to secure better vehicular access at a much lower cost.[164]

There is considerable doubt as to whether emphasis on specialty retailing will necessarily prevent the deterioration of the downtown site. The large department stores are really the heart of the central city retailing structure; when they leave and the area is taken over by wholesaling firms or industry, by expansion of institutions or even by the creation of more parking facilities, the whole aura of the downtown area changes.[165] Specialty goods stores may even be located outside the downtown area, since customers are attracted more by product considerations and store image than by convenience. The central business district location may be replaced by the larger area in the frame where there are several sites easily accessible to customers in noncontiguous residential areas. In a sense, this offers an opportunity to the retailer because it offers several lower cost alternatives instead of the "exclusive" high-cost location. However, the concept of the "hot spot" and all the associated traffic would be gone so that the retailers of goods and services which do not generate their own customers would have to move to the suburbs unless they wished to serve the needs of those who remained in the inner city. This trend validates central place theory concepts since the spatial characteristics of high-order activities are "locational flexibility and selective market orientation instead of central location and city-wide market orientation."[166]

On the whole, the future of the central city site does look somewhat grim. An optimistic summary statement on the future of the CBD is found in Murphy's work.[167] It would appear, as Vance suggests, that there will be a profound reorientation of the structure of retail trade, which will result in the most valued site of yesterday becoming less valuable as it serves the convenience goods needs of only those who work and live nearby. The sites in the frame will become more valuable for those specialty retailers who draw from the entire metropolitan area. The great department stores may remain behind as a tribute to their reputation and the image of going to the city to shop for the really important goods and services. But the action--the growth and profits which remain the raison d'etre of retailing--will be in the great suburban shopping centers.

This conclusion contradicts the opinions expressed by Wheeler and other librarians who believe that the future, as the past, will vindicate the appropriateness of the CBD site for the central library.[168] However, Epstein indicates that "entrapment in an area of degradation . . . will abbreviate the effective life of the business."[169] John Banister represents one of the few dissenting voices from this view when he suggests that the CBD site is now appropriate only for popular adult fiction and business-technology departments.[170] The central city must have appropriate library service. But does the inner city library have to be the central library? Perhaps Wheeler is correct in stating that "even suburban residents" will remain dependent on the downtown area, but I believe that Wheeler's analysis, too often based on popular and incomplete sources, reflects more hope than solid research. Ralph Shaw makes a more refined and sophisticated statement of why the central library needs to be located in the core.[171] We urgently need rigorous analysis and investigation which will determine whether the traditional truths about library site

selection are true today. We also need to consider the future of the central library. Does each public library system need to maintain a major research collection, especially when many urban areas contain academic libraries also engaged in developing research collections? Should the research library be downtown? Thompson suggests an interesting alternative:

> The explosion of the traditional central library into a series of smaller buildings, each housed among the people it is intended to serve, may be the wave of the future. Business libraries and day-time lending libraries in city centres, arts and music libraries near cultural and educational precincts, technical libraries close to industrial complexes. . . .[172]

SHOPPING CENTERS

The growing efficiency of our distribution system has made it possible for the consumer to choose from adequate and attractive assortments of most goods and services in relatively small population centers. It is no longer necessary for the family to dress up and spend a day going to the city to shop. We have already mentioned several reasons why consumers are reluctant to shop in the central city, but another one which should be considered is that many of the traditional "drawing cards" of the city are no longer so unique: culture, sports, and a new outdoor suburban family life are available in comfortable local surroundings. Then too, "a planned regional shopping center contains more commercial square footage than a town of 10,000 or more inhabitants with a business district made up of hundreds of small stores and offices."[173] Thus, the regional shopping center has the drawing power of the central business district of a small city--without the liabilities of that district.

Patterns of population growth and the horizontal rather than vertical spread also induce shopping centers. Suburban areas farthest from the central business district grow the fastest because that is where the most and least expensive vacant land is. Large sites are available in areas where there is substantial growth potential. Relatively low traffic friction means that consumers will travel farther to use large modern facilities.[174] Because they are in a position to intercept traffic flowing to the city, larger shopping centers may receive significant trade from fringe areas. Sites are not always central to the population served, but may be eccentric to the present population because such sites, if properly developed, encourage consumers to travel farther. As mentioned earlier, the growth of the regional shopping center therefore contradicts traditional central place theory.[175] In fact, the larger the center, the more auto-oriented it will be, and therefore the less likely that it will be located in a densely populated area. Since retail sales in suburban areas are increasing at a rate faster than population changes in those areas, retail sales are definitely decentralizing, with substantial losses in the central business district.[176]

If the growth of shopping centers has been beneficial to suburban consumers, it has also been most helpful for retailers able to participate in them. Traffic conditions and ease of access, as well as a pleasant environment, encourage family shopping throughout the day and evening, in contrast to a central city site where traffic is heaviest at peak times and relatively light at others. The shopping center offers the merchant more continuous traffic. The well-known attributes of the shopping center--nearness, parking, hours, and informality--bring the family to the retail shopping center when they would never go to the central city. While retail establishments in the city are arranged according to streets, stores in a shopping center may be arranged in a variety of ways--strip, L, stairstep, cluster, or mall--so that the stores are architecturally compatible and nearly all can be viewed at one time. The center is auto-oriented with access and parking designed for it, while the city is still oriented to an age of pedestrian and public transportation. But there is more to the center than a brighter image and free parking. The site is normally planned with some effort to take account of both present and future needs. It is easy to service stores and remove trash. All facilities on the site are new and attractive. The center management not only provides a congenial image, but also maintains standards to ensure that the shopping environment remains pleasant. There are many types of shopping centers and not all of them are planned and integrated. But even the unplanned center is often better planned than downtown business district sites. Because of these and other reasons, mortality in shopping centers runs considerably below the national retail average. A site within a shopping center would ordinarily give a retailer an immediate advantage over competitors in other types of locations. Applebaum's study[177] ranked supermarket sales and profits by type of location in order of decreasing profit: planned large shopping center; planned neighborhood shopping center; free-standing on main highway; unplanned large business center; unplanned neighborhood business center; isolated neighborhood location; and downtown small town. It is interesting that this least profitable location is the one where the public library is most likely to be located.

But there is not room in centers for everyone. Because of the high cost of building the center on a large site, the rent is usually so high that most centers have no place for low-order functions which must then locate elsewhere. Then too, the high cost of becoming established in a center may be too much for the small independent retailer. One study showed that since 1956, 78 percent of all space in larger shopping centers went to firms with a Dun and Bradstreet rating of AAA, which are usually chain store operations.[178]

Wheeler suggests that this high cost factor will keep libraries out of shopping centers,[179] but Waters believes that a branch library can be a boon to a shopping center so that free or subsidized space is possible if aggressively sought.[180] The Michigan City (Indiana) Public Library is one of several libraries reporting an excellent experience with a shopping center branch library.[181] Interestingly enough, this branch circulates materials to all adults, residents and nonresidents, with acceptable identification. The Mobile (Alabama) Public Library actually purchased a small shopping center

and converted a supermarket to a branch library.[182] There may also be a problem if the center draws many people from outside the library's customary boundaries, but this ought to be easily overcome. One of Wheeler's objections to locating libraries in shopping centers--that many centers have been unsuccessful--appears to be a "red herring" and not a valid objection.

Many local merchants are also reluctant to locate in a center because: (1) they feel that their business does not lend itself to center operation, (2) space is too expensive, (3) they are satisfied with traditional locations, (4) they feel that center stores carry too many low-priced goods, and (5) downtown is better for specialty and high-fashion goods.[183] Many local retailers lack the skills and ambition to establish a shopping center branch. Others fear both a loss of identity and autonomy in having to comply with center policies--such as hours of service--and the cost of having to coordinate with center activities. In this respect, an analogy might be drawn to the smaller public library afraid to join a regional system which requires certain common policies. The shopping center may not be the best site for all retailers, nor is it an instant panacea for all retailing ills. Centers vary greatly in terms of their quality and staying power.

In addition, different sites within the shopping center are more or less valuable. Ordinarily, the strip, L, or sometimes the U-shaped centers are preferred to mall locations which are usually inconvenient. In any type of center, the middle location is best. Parking must be accessible and loading facilities must be adequate. Visibility should be good from all access roads. Traffic within the center should flow freely and merchandise offered should include some convenience shopping. The end location can be best for the retailer selling goods or services which appeal to a great number of people and therefore require much parking space.[184]

The development of the shopping center has had a lasting impact on the structure of retail trade and retail site selection. Even if a retailer or a librarian is unable or does not wish to locate in a center, he must be aware of the center's impact on local shopping patterns so that the site chosen will be the most appropriate one for today and tomorrow.

AFTERWORD

The profit-making business organization has several advantages in its use of the site selection process. It may work fairly quickly and quietly. Generally, it has resources available to secure the best site and it is largely free of the public clamor and debate suffered by the public agency, especially from those groups who have an inappropriate site to peddle. Certainly businessmen, unlike many public officials, would not argue that the cheapest site in the community is the best one. Chait provides an apt summary:

> The location of a public library seems to rank with the floridation of water and the location of expressways through

> cities in its ability to stir the emotions of the citizens of a community. Frequently, it stirs only the emotions and leaves the intelligence and common sense out of the decision-making process. [185]

Joseph Wheeler's writings on public library sites give frequent examples of such emotion-charged battles. Familiarity with the use of retail site selection principles and techniques may not clear the air nor restore intelligence and common sense. However, it should help the librarian to select an appropriate site and also to do a better job of convincing the community that applicable principles of site selection exist and need to be followed.

Library literature on public library site selection is ignorant of the appropriate and frequently helpful literature from marketing and geography. Librarians, with so many information sources at their disposal, should build on the experience and knowledge of other disciplines.

Wheeler cautions against following outdated principles in choosing a library site,[186] yet I wonder how many librarians follow this advice. My paper suggests that we can do this only when we examine the literature of retail site selection, analyze it and relate it to our own concerns. Such critical examination and appropriate borrowing from other disciplines will enrich our own literature of site selection.

One of the assumptions which underlies retail site selection is that a better location will result in more business: as the location of a store or library becomes more convenient, more consumers should use it. Perhaps this assumption is unfounded. Better sites are not a panacea. The best location is of small value if we have something which no one wants to buy. Library nonusers have said that their failure to use the library was not due to poor service or inadequate location, but rather because they felt no need to use it or were too busy.[187]

Applebaum suggests that store location research needs to grow in seven major areas if it is to become scientific.[188] With appropriate changes, these major needs apply quite well to research in public library site selection. They furnish an excellent "shopping list" for public library research. We urgently need:

1. a satisfactory, commonly accepted classification of library location types for research purposes;

2. to assess effectively the impact of competition from other sources of information and recreational materials especially to be able to meaningfully differentiate and classify competition;

3. to know how the effect of variety and quality of materials made available, merchandising methods, condition of library facilities, pleasant and efficient personnel, etc., change circulation and how these relate to site planning;

4. to know more about patrons' information and recreation-seeking behavior;

5. to have better standards and criteria for determining when an area is over- or under-librariedi;

6. to discover additional facts about the effect on library use of such library characteristics as circulation level, library size, use per square foot, age of facility, type of location, population density and income, quality and quantity of competition;

7. to know how many libraries, of what size and where, will produce the most suitable model for covering a market and when one model is more successful than another; and

8. to know how useful are mathematical library location strategy models and whether the computer can be used in library location analysis.

Thoughtul research in these areas could produce substantial improvement in more cost-effective and fruitful sites for public libraries.

REFERENCES

1. Cox, Eli P., and Erickson, Leo G. Retail Decentralization. East Lansing, Bureau of Business and Economic Research, Michigan State University, 1967, p. 1.

2. Garrison, Guy. "Some Recent Public Library Branch Location Studies by City Planners," Library Quarterly 36:153, April 1966.

3. Tucson, Arizona, City-Planning Department. 1970 Library Plan. Tucson, City-Planning Department, 1964, p. 25.

4. Dalrymple, Douglas J. Merchandising Decision Models for Department Stores. East Lansing, Bureau of Business and Economic Research, Michigan State University, 1966, p. 38; and Heald, G. I. "The Application of the Automatic Interaction Detector (A.I.D.) Programme and Multiple Regression Techniques to the Assessment of Store Performance and Site Selection," Operational Research Quarterly 23:446, Dec. 1972.

5. Green, Howard L. "The Retailer's Objectives in Choosing a Store Site." In Curt Kornblau, ed. Guide to Store Location Research. Reading, Mass., Addison-Wesley, 1968, p. 56.

6. Bonser, Charles F., and Wentworth, Jack R. A Study of Adult Information Needs in Indiana. Bloomington, Indiana University, 1970, p. 114.

7. Frank, Ronald E., et al. Market Segmentation. Englewood Cliffs, N.J., Prentice-Hall, 1972.

8. Chitwood, Jack. "Library and Community: Community Analysis, Population Characteristics, Community Growth, Governmental Relationships, Library Site Criteria." In Shaw, Robert J. Libraries: Building for the Future. Chicago, ALA, 1967, pp. 23-28.

9. Gross, Sidney, and Steckler, Phyllis B. How to Run a Paperback Bookstore. New York, R. R. Bowker, 1965, pp. 28-29.

10. Hisrich, Robert D., et al. "Perceived Risk in Store Selection," Journal of Marketing Research 9:435, Nov. 1972.

11. Farley, John U., and Ring, L. Winston. "A Stochastic Model of Supermarket Traffic Flow," Operations Research 14:555-67, July 1966.

12. Cox, Donald F., ed. Risk Taking and Information Handling in Consumer Behavior. Boston, Harvard University Graduate School of Business Administration, 1967, p. 604.

13. Mertes, John E. Self-selection in the Retail Store; An Historical and Functional Analysis. Norman, Bureau of Business Research, University of Oklahoma, 1960, pp. 8, 10, 15; Curhan, Ronald C. "The Relationship Between Shelf Space and Unit Sales in Supermarkets," Journal of Marketing Research 9:406-12, Nov. 1972; _____. "Shelf Space Allocation and Profit Maximization in Mass Retailing," Journal of Marketing 37:54-60, July 1973; and Lynch, Michael. "A Comment on Curhan's 'The Relationship Between Shelf Space and Unit Sales in Supermarkets,'" Journal of Marketing Research 11:218-20, May 1974.

14. Farley and Ring, op. cit.; and Anderson, Evan E., and Amato, Henry N. "A Mathematical Model for Simultaneously Determining the Optimal Brand-Collection and Display-Area Allocation," Operations Research 22:13-21, Jan. 1974.

15. Martineau, Pierre. "The Personality of the Retail Store," Harvard Business Review 36:47-55, Jan. 1958.

16. Collazzo, Charles J., Jr. Consumer Attitudes and Frustrations in Shopping. New York, National Retail Merchants Association, 1963, p. 1.

17. Ferber, Robert, ed. Handbook of Marketing Research. New York, McGraw-Hill, 1974.

18. Epstein, Bart J. "Geography and the Business of Retail Site Evaluation and Selection," Economic Geography 47:192, April 1971.

19. Chitwood, op. cit.

20. Thompson, Godfrey. Planning and Design of Library Buildings. London, The Architectural Press, 1973, p. 38.

21. Chitwood, Julius R. "Elementary Notes on Site Selection." In Alphonse F. Trezza, ed. Library Buildings: Innovation for Changing Needs; Proceedings. Chicago, ALA, 1972, p. 152.

22. Ibid.

23. Thompson, op. cit., p. 38; and Myller, Rolf. The Design of the Small Public Library. New York, R. R. Bowker, 1966, p. 27.

24. Peterson, Harry N. Branch Library Survey of Fort Worth Public Library. Fort Worth, Tex., Fort Worth Public Library, 1959, pp. 50, 54.

25. South Bend, Indiana. City Planning Commission. Report on Central Library Site. South Bend, City Planning Commission, 1958.

26. Garrison, op. cit., p. 151.

27. Cox and Erickson, op. cit., p. 1.

28. Davies, Ross. "The Location of Service Activities." In Michael Chisholm and Brian Rodgers, eds. Studies in Human Geography. New York, Crane, Russak & Co., 1973, pp. 125-71.

29. Berry, Brian J. L. "Central Place Theory." In Kornblau, op. cit., p. 18.

30. Forbes, J. D. "Central Place Theory--An Analytical Framework for Retail Structure," Land Economics 48:15, Feb. 1972.

31. Berry, op. cit.; and _____. Geography of Market Centers and Retail Distribution. Englewood Cliffs, N.J., Prentice-Hall, 1967.

32. Forbes, op. cit., p. 21.

33. Mertes, op. cit., pp. 30-32.

34. Berry, Brian J. L. Commercial Structure and Commercial Blight; Retail Patterns and Processes in the City of Chicago (Department of Geography, Research Paper No. 85). Chicago, University of Chicago Press, 1963, p. 19.

35. Brush, John E., and Gauthier, Howard L., Jr. Service Centers and Consumer Trips: Studies on the Philadelphia Metropolitan Fringe (Department of Geography Research Paper No. 113). Chicago, University of Chicago Press, 1968, p. 13.

36. Berry, Geography of Market Centers . . ., op. cit., p. 124.

37. Nelson, Richard L. The Selection of Retail Locations. New York, F. W. Dodge Corporation, 1958, pp. 30-31.

38. See, for example, Cleveland, Cuyahoga County, Ohio. Regional Planning Commission. Changing Patterns; A Branch Library Plan for the Cleveland Metropolitan Area. Cleveland, Regional Planning Commission, 1966, pp. xiv, 32.

39. Monat, William R. The Public Library and its Community: A Study of the Impact of Library Services in Five Pennsylvania Cities. University Park, Institute of Public Administration, Pennsylvania State University, 1967, pp. 91, 93.

40. Reilly, William J. Methods for the Study of Retail Relationships. Austin, Bureau of Business Research, University of Texas, 1959, p. 48.

41. Cox and Erickson, op. cit., p. 2.

42. Reilly, op. cit., p. 5.

43. Ibid., pp. 21-22.

44. Converse, Paul D. "New Laws of Retail Gravitation." In Kornblau, op. cit., p. 21.

45. Kane, Bernard J., Jr. A Systematic Guide to Supermarket Location Analysis. New York, Fairchild, 1966, p. 30; Heald, op. cit., p. 447; and Claus, R. James, and Hardwick, Walter G. The Mobile Consumer: Automobile-Oriented Retailing and Site Selection. Don Mills, Ontario, Collier-Macmillan, 1972.

46. Cox and Erickson, op. cit., p. 3.

47. Kane, op. cit., p. 30.

48. Roberts, R. G. "Reilly's Law: The Law of Retail Gravitation," Library Association Record 68:390-91, Nov. 1966.

49. Simmons, James W. The Changing Pattern of Retail Location (Department of Geography Research Paper No. 92). Chicago, University of Chicago Press, 1964, p. 33.

50. Nelson, op. cit., p. 58.

51. Ibid.

52. Horton, Frank E. "Location Factors as Determinants of Consumer Attraction to Retail Firms," Annals of the Association of American Geographers 58:791, Dec. 1968.

53. White, L. A., and Ellis, J. B. "A System Construct for Evaluating Retail Market Locations," Journal of Marketing Research 8:43-46, Feb. 1971.

54. Wilson, Alan G. Urban and Regional Models in Geography and Planning. New York, Wiley, 1974, pp. 204-09.

55. Applebaum, William. "Can Store Location Research Be a Science?" Economic Geography 41:237, July 1965.

56. _____. "Store Location Research--Art or Science?" In Kornblau, ed., op. cit., pp. 3-5.

57. Morris, Gordon. "Detroit News' Computer Tells Retailers Where to Locate," Editor & Publisher 104:48-49, Jan. 9, 1971.

58. Horton, op. cit., p. 791 fn.

59. Leigh, Roger. Specialty-Retailing: A Geographic Analysis (B.C. Geographical Series No. 6). Vancouver, Tantalus Research Limited, 1966, p.31; and Thompson, Donald L. Analysis of Retailing Potential in Metorpolitan Areas. Berkeley, Institute of Business and Economic Research, University of California, 1964, p. 10.

60. Horton, op. cit., p. 792.

61. Applebaum, William, and Cohen, Saul B. "Guideposts to Store Location Strategy." In Kornblau, ed., op. cit., p. 35.

62. Mertes, John E. "Site Opportunities for the Small Retailer," Journal of Retailing 39:42, Fall 1963.

63. Cox and Erickson, op. cit., p. 47.

64. Community Studies, Inc. A Study of Branch Library Location and Service. Kansas City, Community Studies, Inc., 1952, pp. 12, 13, 24.

65. Grundt, Leonard. "Branch Library Inadequacies in a Typical Large City," Library Journal 90:3997-4001, Oct. 1, 1965.

66. Tucson, Arizona, City-Planning Department, op. cit., p. 10.

67. Martin, Lowell A. Library Service for Baltimore County. Baltimore, Baltimore County Board of Trustees, 1957, p. 79.

68. Collazzo, op. cit., p. 41.

69. Applebaum, William. "Store Performance in Relation to Location and Other Characteristics," Chain Store Age (Supermarket Executive's Edition), 41:E14-E16, Nov. 1965.

70. Collazzo, op. cit., p. 107.

71. Thompson, Donald L., op. cit., p. 52.

72. Kane, op. cit., p. 26.

73. Nelson, op. cit., pp. 160, 184.

74. Mertes, John E. Creative Site Evaluation for the Small Retailer. Norman, Okla., University of Oklahoma, 1962, pp. 65, 92; and Claus and Hardwick, op. cit., p. 140.

75. Martin, Lowell A. Progress and Problems of Pennsylvania Libraries: A Re-survey (Monograph No. 6). Harrisburg, Pennsylvania State Library, 1967, p. 35.

76. Collazzo, op. cit., pp. 117, 122.

77. Simmons, op. cit.

78. Collazzo, op. cit., pp. 7, 23.

79. Ibid., p. 10.

80. Ibid., pp. 43, 94, 104.

81. Nelson, op. cit., p. 101; Mertes, Creative Site Evaluation . . . , op. cit., pp. 49-53; and _____,"Site Opportunities . . . ," op. cit., pp. 39-42.

82. Nelson, op. cit., pp. 129, 131, 184.

83. Mertes, Creative Site Evaluation . . . , op. cit., p. 103; _____, "Site Opportunities . . . ," op. cit., p. 44; and Nelson, op. cit., p. 184.

84. Kane, op. cit., p. 124.

85. Nelson, op. cit., p. 105.

86. Mertes, Creative Site Evaluation . . . , op. cit., p. 88.

87. Green, op. cit., p. 55.

88. Plovgaard, Sven, ed. Public Library Buildings. London, The Library Association, 1971, p. 81.

89. Applebaum, "Store Location Research . . . ," op. cit., p. 6.

90. Simmons, op. cit., p. 12.

91. Mertes, Creative Site Evaluation..., op. cit., pp. 27-34.

92. Schell, Eileen. Changes in Boston's Retail Landscape: A Geographic Study of Fourteen Years Change in Retail Distribution Patterns (University Studies in Retail Research, vol. 4). New York, National Retail Merchants Association, 1964, pp. 18-19.

93. Applebaum, William. "Outline for a Store Location Strategy Study." In Kornblau, ed., op. cit., pp. 59-61; and Zaloudek, Robert F. "Practical Location Analysis in New Market Areas," Stores 53:15, 40-41, Nov. 1971.

94. Green, op. cit., p. 55.

95. Applebaum, William, and Schell, Eileen. "Marketing Maps for Store Location Studies." In Kornblau, ed., op. cit., pp. 143-205.

96. Cohen, Saul B., and Applebaum, William. "Major Considerations in Evaluating a Store Site." In Kornblau, ed., op. cit., p. 91.

97. Clough, E. A. "Where Do Readers Live?" Research in Librarianship 1:164-68, June 1967.

98. Epstein, op. cit., p. 195.

99. Ibid., pp. 193-94.

100. Mertes, "Site Opportunities . . . ," op. cit., pp. 44-45.

101. Heald, op. cit., p. 451.

102. Wheeler, Joseph L. The Effective Location of Public Library Buildings (Occasional Paper No. 52). Urbana, University of Illinois Graduate School of Library Science, 1958, p. 2.

103. Applebaum, "Store Location Strategy . . . ," op. cit., pp. 60-61.

104. Kane, op. cit., p. 64; Mertes, "Site Opportunities . . . ," op. cit., pp. 44-45; and Applebaum, William. "Guidelines for a Store-Location Strategy Study," Journal of Marketing 30:42-45, Oct. 1966.

105. Claus and Hardwick, op. cit., p. 7.

106. Ibid., p. 146.

107. Ibid.; and Mertes, "Site Opportunities . . . ," op. cit.

108. Epstein, op. cit., p. 195.

109. Ibid., p. 193.

110. Ibid., p. 199.

111. Zaloudek, op. cit., p. 40.

112. Ibid.

113. Claus and Hardwick, op. cit., p. 144.

114. Ibid., pp. 150-54.

115. Zaloudek, op. cit., p. 41.

116. Huff, David L. "A Programmed Solution for Approximating an Optimum Retail Location," Land Economics 42:293-303, Aug. 1966.

117. Berry, Commercial Structure . . . , op. cit., pp. 163-64.

118. Mertes, Creative Site Evaluation . . . , op. cit., p. 1.

119. Vance, James E., Jr. "Emerging Patterns of Commercial Structure in American Cities." In Knut Norberg, ed. Proceedings of the IGU Symposium in Urban Geography. Lund, Sweden, The Royal University, 1962, p. 488.

120. Philadelphia Free Library. A Regional Library System for Philadelphia: A Contemporary Pattern of Library Service. Philadelphia, Free Library, 1956, p. 17.

121. Chitwood, Jack, op. cit., p. 27.

122. Berry, Commercial Structure . . . , op. cit., p. 166.

123. Simmons, op. cit., p. 105.

124. Schell, op. cit., p. 88.

125. Berry, Commercial Structure . . . , op. cit., p. 199.

126. Cleveland, op. cit., pp. xiii, 50.

127. Simmons, op. cit., p. 162; and Nelson, op. cit., p. 321.

128. Simmons, op. cit., p. 9.

129. Wheeler, op. cit., p. 17.

130. Wheeler, Joseph L. Report of a Survey of Public Library Building Problems in Grosse Pointe, Michigan. Grosse Point, Board of Education, 1949, p. 29.

131. Martin, Library Service for Baltimore County, op. cit., p. 196.

132. Berry, Commercial Structure . . . , op. cit., p. 166.

133. Simmons, op. cit., pp. 150, 151.

134. Mertes, Creative Site Evaluation . . . , op. cit., p. 38.

135. "Commuter Library Branch Serves Cleveland Terminal," Library Journal 94:488, Feb. 1, 1969.

136. Schell, op. cit., p. 42.

137. Bowler, Roberta, ed. Local Public Library Administration. Chicago, International City Manager's Association, 1964, p. 300.

138. Green, Leslie R. "The Location of Public Facilities: A Case Study of the Site Selection for a Central Library in Knoxville, Tennessee," Master's thesis prepared for the University of Tennessee, Knoxville, 1972.

139. Leigh, op. cit., pp. 6-9.

140. Horwood, Edgar M., and Boyce, Ronald R. Studies of the Central Business District and Urban Freeway Development. Seattle, University of Washington Press, 1959, pp. 11-15.

141. Sternlieb, George. The Future of the Downtown Department Store. Cambridge, Mass., Joint Center for Urban Studies, 1962, pp. 7, 9; and Leigh, op. cit., p. 8.

142. Sternlieb, op. cit., p. 176.

143. Weiss, E. B. "New Store Locations in the City Core," Stores 54:43, May 1972.

144. Horwood and Boyce, op. cit., p. 22.

145. Sternlieb, op. cit., p. 15.

146. Schell, op. cit., p. 40.

147. Berry, Geography of Market Centers, op. cit., p. 122.

148. McKelvey, Robert A. "Retailings Future in Downtown: Part One, The Marketplace and the Urban Network," Stores 55:15-16, 26-27, Feb. 1973.

149. Collazzo, op. cit., pp. 16-17.

150. Schell, op. cit., p. 77.

151. See, for example, Murphy, Raymond E. The Central Business District. Chicago, Aldine-Atherton, 1972, p. 170.

152. Sternlieb, op. cit., p. 179.

153. Berry, Commercial Structure . . . , op. cit., p. 29.

154. Vance, op. cit., p. 485.

155. Sternlieb, op. cit., p. 1.

156. Ibid., p. 33.

157. Schell, op. cit., pp. 60-61.

158. Sternlieb, op. cit., pp. 37, 178.

159. Vance, op. cit., pp. 498, 490.

160. Ibid., pp. 493, 512.

161. Ibid., pp. 517-18.

162. Tucson Arizona City-Planning Department, op. cit., p. 20.

163. Ward, Margaret. The Fullerton Public Library: A Study with Recommendations. Sacramento, Calif., State Library, 1967, p. 13.

164. Thompson, Godfrey. Planning and Design of Library Buildings. London, The Architectural Press, 1973, p. 38.

165. Schell, op. cit., p. 56.

166. Leigh, op. cit., p. 113.

167. Murphy, op. cit., pp. 169-77.

168. Monat, op. cit., p. 92.

169. Epstein, op. cit., p. 194.

170. Banister, John R. "Accent on Gracious Service," Library Journal 76:2077-79, Dec. 15, 1951.

171. Shaw, Ralph R. Libraries of Metropolitan Toronto: A Study of Library Service Prepared for the Library Trustees' Council of Toronto and District. Toronto, Library Trustees' Council, 1960, pp. 5-6.

172. Thompson, Godfrey, op. cit., p. 38.

173. Brush and Gauthier, op. cit., p. 93.

174. Schell, op. cit., pp. 51-52.

175. Simmons, op. cit., p. 114.

176. Cox and Erickson, op. cit., p. 19.

177. Applebaum, William. "Store Characteristics and Operating Performance." In Kornblau, ed., op. cit., p. 48.

178. Davidson, Thomas L., et al. Some Effects of the Growth of Planned and Controlled Shopping Centers on Small Retailers. Storrs, Conn., University of Connecticut, 1960, p. 88.

179. Wheeler, The Effective Location . . . , op. cit., p. 33.

180. Waters, Richard. "Free Space: Can Public Libraries Receive It," ALA Bulletin 58:232-34, March 1964.

181. Adams, Charles J., and Robinson, Joel. "This Mall Serves All," Library Journal 97:653-55, Feb. 15, 1972.

182. "Mobile Buys a Shopping Ctr.: Site for New Library Branch," Library Journal 99:436, Feb. 15, 1974.

183. Davidson, et al., op. cit., pp. 113, 115.

184. "How Chains are Stalking Best Locations within Centers," Chain Store Age 40:E14-E17, May 1964.

185. Chait, William. "Library Planning." In Planning 1961. Chicago, American Society of Planning Officials, 1961, p. 156.

186. Wheeler, Joseph L. A Reconsideration of the Strategic Location for Public Library Buildings (Occasional Paper No. 85). Urbana, University of Illinois Graduate School of Library Science, 1967, p. 3.

187. Cleveland, op. cit., p. 36.

188. Applebaum, "Store Location Research . . . ," op. cit., p. 5.

ADDITIONAL REFERENCES

Epstein, Bart J. "Evaluation of an Established Planned Shopping Center," Economic Geography 37:12-21, 1961.

Hansen, Niles M. Challenges of Urban Growth: The Basic Economies of City Size and Structure. Lexington, Mass., Lexington Books, 1975.

Martin, Lowell A. Progress and Problems of Pennsylvania Libraries; A Re-Survey. Harrisburg, Penn., State Library, 1967.

Staniford, Edward F. Business Decentralization in Metropolitan Los Angeles. Los Angeles, Bureau of Governmental Research, U.C.L.A., 1960.

Paper submitted August 1975

William C. Robinson is Assistant Professor, Graduate School of Library and Information Science, The University of Tennessee, Knoxville.

OCCASIONAL PAPERS deal with any aspect of librarianship and consist of manuscripts which are too long or too detailed for publication in a library periodical or which are of specialized or temporary interest. Manuscripts for inclusion in this series are invited, and should be sent to: OCCASIONAL PAPERS, Publications Office--249 Armory Bldg., University of Illinois Graduate School of Library Science, Champaign, Illinois 61820.

Papers in this series are issued irregulary, and no more often than monthly. Subscriptions can be established for $7.00 per year. At least five papers will be issued annually, beginning with number 122 for 1976. Individual copies of current or back numbers may be ordered for $2.00 each (prepaid). Send orders to: OCCASIONAL PAPERS, Publications Office--249 Armory Bldg., University of Illinois Graduate School of Library Science, Champaign, Illinois 61820. Make checks payable to University of Illinois.